

The copyright of this thesis vests in the author. No quotation from it or information derived from it is to be published without full acknowledgement of the source. The thesis is to be used for private study or non-commercial research purposes only.

Published by the University of Cape Town (UCT) in terms of the non-exclusive license granted to UCT by the author.

**Challenging Common Sense about Nonsense: An Integrational Approach to
Schizophrenic Language Behaviour**

Jennifer Amy Forbes Poole

PLXJEN004

A dissertation submitted in fulfillment of the of the requirements for the award of the degree
of Master of Arts in Linguistics

Faculty of the Humanities

University of Cape Town

2009

DECLARATION

This work has not been previously submitted in whole, or in part, for the award of any degree. It is my own work. Each significant contribution to, and quotation in, this dissertation from the work, or works, of other people has been attributed, and has been cited and referenced.

Signed by candidate

Signature: signature removed

Date: 09 . 04 . 09

ABSTRACT

Due to certain fundamental flaws, orthodox linguistics has not succeeded in producing a coherent account of 'schizophrenic language' – the host of symptoms that are alternatively characterised as evidence of formal thought disorder or labelled as disorganised speech, a disorder in itself. The most important of these flaws are its treatment of languages as fixed codes, which doubles as an explanation of how linguistic communication works, and its postulation of the mental structures that would be necessary if languages were indeed fixed codes, and communication a matter of encoding and decoding messages. In particular, orthodox linguistics has bolstered the now-dominant neo-Kraepelinian, biomedical account of schizophrenia, which treats utterances as symptoms that give clues to brain (dis)organisation and (dys)function. Integrational linguistics, which criticises the culturally based assumptions – collectively referred to as 'the language myth' – that are at the heart of the orthodox account of languages and language, provides an alternative. It sympathises with the growing trend in cognitive science and philosophy towards 'embodiment' and 'distributed cognition', which recognises that encultured entities like languages, minds, brains, bodies, and world are intrinsically defined by their co-evolution in the species, and co-emergence during an individual's development. Integrationists argue that by focusing in the first instance on second-order cultural constructs called 'languages', orthodox linguistics fails to give an account of the first-order experience of language users.

This thesis approaches the topic of 'schizophrenic language' from a broadly integrationist perspective in order to demonstrate that because orthodox linguistics is so widely taken for granted in psychiatry, its biases inform current mainstream accounts of schizophrenic language, motivate the outright dismissal of interpersonal accounts, past and present, and provide a skewed picture of the phenomenon it purports to be describing, by ultimately constructing an individual-focused, deficit-based account of what is not, as opposed to what is. That is, by holding up orthodox linguistics' idealised version of communication and speakers (which has little applicability even to 'normal' language users), it uses deviation from the ideal as description and explanation, rather than recognising the strategies actually employed by schizophrenics in their attempts to make sense, even if these attempts fail.

The alternative argued for here is to apply the tenets of integrationist linguistics to schizophrenic language behaviour, to give a fuller account of communication situations involving schizophrenics and normal interlocutors. As a result, this thesis calls for a reformulation of the idea that incomprehensibility stems from deviant speech, itself the product of an irrational brain. 'Sense', 'deviance' and 'irrationality' are a moment-to-moment metalinguistic appraisals made by language users, second-order cultural constructions that shape the speech community's response to certain individuals. Describing the speech of schizophrenics as 'deviant', 'irrational', or 'nonsensical' constrains their jointly-constructed capability of making sense using the resources (which may include other individual's minds) at their disposal. Integrational linguistics thus brings into focus a moral and political dimension to such descriptions which is obscured by an orthodox linguistics-biased biomedical approach.

CONTENTS

Introduction	1
i. Making sense of ‘nonsense’.....	1
ii. Points.....	3
iii. Structure.....	4
iv. A note on terms.....	5
v. In closing.....	6
 Chapter 1: A Brief Overview of Schizophrenia	 7
1.1 Introduction.....	7
1.2 History.....	7
1.2.1 Kraepelin.....	8
1.2.2 Bleuler.....	9
1.2.3 Their legacy.....	10
1.2.4 Schizophrenia: the concept.....	11
1.3 Symptoms and diagnosis.....	12
1.3.1 Symptoms.....	12
1.3.2 Grouping of symptoms.....	14
1.3.3 Diagnosis.....	14
1.4 Causes.....	16
1.4.1 Genetics.....	16
1.4.2 The knocks of life.....	17
1.4.3 Society and the family.....	17
1.4.4 Brain.....	18
1.5 Treatment.....	19
1.5.1 The early years.....	19
1.5.2 Drugs.....	19
1.5.3 Psychotherapy.....	20
1.5.4 De-institutionalisation.....	20
1.6 Conclusion.....	21

Chapter 2: Critical Linguistics	22
2.1 Introduction.....	22
2.2. The problem.....	27
2.3 The solution.....	30
2.4 Linguistic knowledge.....	33
2.5 Metadiscourse.....	36
2.6 Writing.....	40
2.7 Ideal speech and speech errors.....	44
2.8 Signs.....	48
2.9 Semantics.....	49
2.10 Metaphor.....	52
2.11 Language emergence.....	56
2.12 Language: embodied, embedded, encultured.....	60
2.13 Conclusion: language and rationality.....	65
 Chapter 3: The Language Myth Bias in Studies of Schizophrenic Language	 69
3.1 Introduction.....	69
3.2 The current mainstream view.....	70
3.2.1 The biomedical approach.....	73
3.2.2 Competence/performance.....	77
3.2.3 The schizophrenic speech circuit.....	79
3.2.4 Defining language.....	82
3.2.5 Grammaticality.....	84
3.2.6 Schizophrenic semantics.....	86
3.2.7 Schizophrenic pragmatics.....	87
3.2.8 Written language.....	90
3.2.9 Formal thought disorder.....	92
3.2.10 Language evolution.....	95

Chapter 4: The Changing Concept of Language in Schizophrenia	99
4.1 The early years.....	99
4.2 The 1940s.....	109
4.3 The 1960s.....	113
4.4 Enter the linguist.....	122
4.5 Conclusion.....	129
 Chapter 5: Orthodox Linguistics and Schizophrenia: Implications and Alternatives	 131
5.1 Evolution.....	132
5.2 The biomedical approach.....	134
5.3 The deficit model.....	136
5.4 The not-so-ideal (excluded) real speaker.....	138
5.5 Writing.....	141
5.6 Auditory hallucinations.....	142
5.7 Metaphor.....	144
5.8 Meaning.....	146
5.9 Context.....	148
5.10 Interpersonal accounts.....	151
5.11 Debate.....	153
5.12 Conclusion.....	154
 Conclusion	 157
 References	 159

LIST OF ILLUSTRATIONS

Tables

Table 2.1: Differences between speech and writing.....	43
Table 3.1: Andreason's (1979) main types of thought, language and communication disorder.....	94

Figures

Figure 3.1: Model of communication processing in schizophrenics.....	80
--	----

INTRODUCTION

“I’m not trying to make noise. I’m trying to make sense. If you can make sense out of nonsense, well, have fun. I’m trying to make sense out of sense. I’m not making sense (cents) anymore. I have to make dollars.” (Schizophrenic patient in Andreason, 1979:1320)

i. Making sense of ‘nonsense’

Linguistics, usually glossed as the ‘science of language’ (Pateman, 1987:1), aims to make sense of how we make sense of, and with, language, by accurately describing the nature and characteristics of language. In particular, it has concerned itself with the structure of languages (and by extension, language) and the rules that appear to govern its use. By and large, languages are regarded as a type of code through which humans convey meaning, in a process called communication. By virtue of this shared standardised code, humans speaking the same language understand each other’s encoded meanings.

Misunderstandings do occur; from time to time there appears to be a code failure. Of course, a code cannot really fail – people can only fail in their knowledge or appropriate use of thereof. Slips of the tongue, mishearing, second-language speakers, children learning their first language, jargon, ambiguity all represent everyday opportunities for miscommunication. In recent decades, linguistics has extended its focus to cases of a sustained and pathological breakdown in communication; for certain individuals, the effortless conveyance of meaning we have come to expect from language no longer occurs. In some, the broader cause is fairly obvious; lesions caused by trauma or disease mean the destruction of brain tissue formerly dedicated in some way to language. For others, the disturbance seems to be linked to the mental illness it accompanies, the cause for both as yet unknown, but widely regarded as having their mutual origins in abnormal brain structure or function. It is this latter group with which this thesis is concerned; and those diagnosed with schizophrenia in particular.

Schizophrenia, as a mental illness, is located firmly in the province of psychiatry, the ‘medicine of the mind’. The approach towards linguistic behaviour adopted in medical models of schizophrenia is fairly consistent: language is an autonomous faculty/ability, although it may interact with other faculties/abilities. Language impairment is the result of a

faulty brain, although unlike in aphasia, there is no obvious brain trauma.¹ The psychological bent of the discipline points to the likelihood that schizophrenic language impairment is indicative of faulty thinking. All behaviour can thus be taken as directly symptomatic of this broken mind/brain. Dissent (generally) comes from outside the medical realm. Both psychiatry and psychology seem, either implicitly or explicitly, to employ an understanding of language that is closely aligned with mainstream, traditional linguistics.

Etiology is however of little concern to linguists, and for the most part left to psychiatrists and neurologists. In an attempt to make sense of the nature of this sudden failure or absence of meaning, this 'non-sense', linguistics attempts to look for systematic deviations from the standard code and rules used by normals. The implication then is that these deviations are responsible for the misunderstanding, either perceived, on the part of the patient, or received, on the part of their healthy interlocutor, and even could potentially help refine descriptions of the essential nature of the linguistic code and its rules.

Linguistics as a discipline has undergone a series of internal revolutions within a relatively short space of time,² each of them centring around just what exactly it is the business of linguists to be studying, or put differently, defining language. Despite its many revisions, it is still subject to criticism, and it is one recent line of attack, from within, that will be applied to linguistics' involvement with pathological language. Integrational linguistics poses a radical challenge to orthodox linguistics, by calling into question the very foundations on which the discipline is based. By implication, therefore, it also stands opposed to orthodox linguistic explanations of linguistic behaviour in those labeled 'schizophrenic'. However, a comprehensive integrational linguistic account of psychotic language behaviour has yet to be published.

¹ There is a long tradition of comparing schizophrenic speech with that of aphasics, perhaps because it is the only disorder that bears any resemblance to the breakdown in communication experienced by those in conversation with schizophrenics. It has become apparent that there are definite distinctions between the disorders, as shall be discussed in Chapter 4.

² Just how short, is subject to debate – see Newmeyer (1987).

ii. Points

My argument is threefold: firstly, certain assumptions about language, collectively referred to as ‘the language myth’ by integrational linguists, have significantly shaped the course of research into schizophrenic language, and even, to a degree, of schizophrenia in general,³ particularly due to the centrality ‘language’ has been afforded in recent conceptions of the disease. The ‘languages as codes’ idea, and that this provides the explanation for how communication takes place, referred to above, form the two central fallacies that make up the language myth. This reification of languages as fixed and bounded entities, which individuals somehow house in their brain, has resulted in all manner of flawed accounts of what a breakdown in communication entails, based on an assumption of how successful communication takes place. While evidence of the language myth can be found even in the very earliest works on schizophrenia (written a little over a century ago), the direct involvement of linguists has deepened its influence in shaping research questions about schizophrenic language behaviour. The fact that there is even a subfield of research into psychotic language could be interpreted as a product of the language myth.

Secondly, the language myth has enabled the cementing of, and continues to reinforce, the stark dichotomy between ‘normals’ and those with ‘deficits’. The concept of positive and negative symptoms aside, the linguistic behaviour of schizophrenics is largely described in terms of deficit. Negative symptoms are clearly the *absence* of normal behaviour, positive symptoms are the result of a *lack* of the control that ensures only normal behaviour ‘gets out’. Schizophrenics’ minds, or their language (depending on the theory), are defined by the abnormality of their various attributes or characteristics.⁴ The discourse of traditional or orthodox language theory does not allow for actual descriptions of what is *there*, only what is not.

Thirdly, both schizophrenia studies and integrational linguistics stand to benefit from an integrational account of schizophrenic language behaviour. It offers a more nuanced understanding of observed/recorded behaviour than the usual ‘deviant output from a

³ That this is the case is hardly surprising: it has already been demonstrated that “the language myth plays a considerable role in [other] contemporary social institutions” (Harris, 2006:716).

⁴ Linell (2005) has made a similar point about patients with brain damage and/or aphasia (see below in Chapter 2).

broken brain' scenario, and may provide a way out of the stalemate that some debates on how best to characterise the phenomenon (of schizophrenic language) have reached. It challenges integrational linguistics to broaden its scope, and to question the normal/deviant dichotomy that has dominated traditional orthodox linguistics. If it is to remain true to its founding principles, integrational linguistics has to be able to give an account of all language behaviour, not merely that which is considered 'normal'. If it does not, it runs the risk of merely replacing the much reviled 'ideal-speaker-hearer' with another idealised account of language behaviour that is as unrealistic; shifting but not eradicating the boundaries of what counts as relevant, and who counts as a member of the speech community.

iii. Structure

Despite its lifetime prevalence rate of 1 in every 100 people (Frith & Johnstone, 2003), schizophrenia is a disease that remains hidden from the public eye, and is largely misunderstood by the general population. Chapter 1 provides a brief overview of its history, symptoms, diagnosis, possible causes, and treatment, as background.

As Chapter 2's title indicates, integrational linguistics takes a critical stance against traditional ('segregationist') studies of language, founded upon what they regard as an unquestioned 'myth' about the nature of language itself. The chapter provides an overview of integrational linguistics, by focusing on the work of three theorists in the field, Roy Harris, Michael Toolan, and Talbot Taylor. It also introduces Per Linell's notion of 'dialogism', which, like integrationism, mounts a critique against the founding assumptions of orthodox linguistics.

In Chapter 3, I attempt to provide a clearer picture of the 'official' or dominant position on schizophrenic language behaviour and, armed with a newfound ability to recognise the hallmarks of traditional 'segregationist' linguistics (gleaned from Chapter 1), I assess this position for evidence of the influence of the 'language myth'. Chapter 4 takes a more historical perspective, tracing the changing concept of 'language' within the first century of research on schizophrenia, highlighting the distinct shift that occurred with the overt involvement of linguists and linguistics.

And finally, although the main aim of this thesis is to argue that a critical, integrational linguistic account of schizophrenic language behaviour is necessary, it does take a few tentative steps towards outlining what such an account might look like: by demonstrating the flaws in the dominant approach, and enlisting the help of work that has largely been overlooked by the orthodox position on schizophrenic language behaviour, Chapter 5 sketches the integrational response.

iv. A note on terms

As shall be discussed in the first chapter, 'schizophrenia' is by no means an uncontested term. While the official psychiatric diagnostic materials acknowledge a single disease with subtypes, it has long been argued that perhaps what has been lumped together under one name is really a family of diseases with distinct etiology. Still others have argued for the term to be discarded altogether, seeing it as an imprecise diagnosis, a misleading label, and some even claiming that as a disease, schizophrenia does not exist.

I do not wish my use of the term 'schizophrenia' to be regarded as dismissive of these debates; on the contrary, that they exist is testament to some of the concerns that drive this thesis. However, despite its unresolved ontological status, 'schizophrenia' is a label for a concept (albeit fuzzy) that has a very real significance for the lives of people to whom it is applied. My concern is with the underlying beliefs of those who wield the construct, in theory and in practice, based on their assumption that it holds some degree of validity.

The specific 'symptom' on which this thesis focuses is also problematic to name. I have settled on the somewhat awkward 'schizophrenic language behaviour'⁵ (to be abbreviated henceforth as SLB) with a view to allowing for distinctions between speech and writing, and to incorporate phenomena which are often excluded from strictly orthodox linguistic accounts. The word 'behaviour' attempts to draw attention to the fact that much of what has been included in descriptions of the phenomenon are really inferences based on observation (and this 'observation' may include self-report). While I do not deny that there is thinking/cognition going on, we do not have direct access to this activity/these thoughts, and a clearer distinction should be made between the oft-conflated observed/experienced

⁵ I am by no means the first to use this term; Wodak & Van de Craen (1987), among others, employ it.

and the inferred. That said, there is a sense in which there is no way of neutrally describing 'observable behaviour'; it is always already infused with interpretation.

v. In closing

I do not pretend to offer a new theory of schizophrenia or SLB. Such an endeavour is well beyond the scope of the thesis, and the knowledge and abilities of its writer. Furthermore, by focusing on the social/interactional realm of SLB, I do not mean to imply that there is no biological basis to the phenomenon. However, neurolinguistic accounts will fail to give a full account if they ignore the context of language (body and world) and the use to which it is put, and rely on the orthodox linguistic tendency to treat it as an independent/autonomous system. Integrational linguistics may help to account for some of the discrepancies and contradictions with which current research continues to grapple.

A theory of abnormal or deviant language is also simultaneously and implicitly a theory of 'normal' response to this language. Most accounts of SLB based on an orthodox linguistics succeed in erasing, obscuring or downplaying the metalinguistic activity of both the hearer/receiver/assessor/theorist of schizophrenic utterances, and that of the schizophrenic producer. We are presented only with 'product', apparently free of the traces of the work of production (or rather, the only 'work' that is acknowledged is the deficient mental activity located in the brain of the schizophrenic). A fuller picture is required. To be sure, no account or theory can hope to include everything in its explanation; to identify patterns and similarities across different contexts, by definition requires that certain aspects of individual events be disregarded as irrelevant (or less relevant) variables. Integrational linguistics calls for a greater awareness of the metalinguistic work (particularly that engaged in by theorists and clinicians) that is involved in separating out the constants from the variables, and a recognition that these are a product of our (inclusive of *all* who use language) activity, not given in advance by some autonomous system.

1. A BRIEF OVERVIEW OF SCHIZOPHRENIA

1.1 Introduction

Roughly one per cent of the population will be affected by the disease during their lifetime, with the onset for most occurring in early adulthood. It appears in all cultures, all countries at a relatively similar incidence rate. It places a heavy burden on governments economically, and on friends and family members of the patient both economically and emotionally. Despite its relatively common occurrence, schizophrenia is a disease about which the general public are largely uneducated and, as has been observed countless times, ignorance breeds fear (Frith & Johnstone, 2003).

Even though in recent years films such as *A Beautiful Mind* (2001) have perhaps helped to dispel the myth that schizophrenia is synonymous with multiple personality disorder, common associations with the term, such as 'hearing voices', only scratch the surface of what the disease is about. Another misconception in the mind of the public arises from the conflation of 'psychotic' with 'psychopathic' – indeed the word 'psycho' has entered common use to indicate a violent, crazed individual. The picture that emerges after a bit of reading on the subject is very different from the one portrayed by popular media.

1.2 History

Reports of madness date back to the beginnings of recorded history. That said, the concept of madness has altered over time. While some scholars claim they can pinpoint examples of modern mental illness in ancient texts, this retrospective diagnosis is frowned upon by most (Frith & Johnstone, 2003; Neale & Oltmanns, 1980). One can say with some confidence that, although there is evidence that people even in ancient times displayed some of the symptoms that those diagnosed as schizophrenic do, this is not sufficient to declare that schizophrenia – the disease we know today – has always been around (Frith & Johnstone, 2003). Based on the accumulated evidence, Shorter (1997) considers it most plausible that it is a modern condition (the recency hypothesis), as opposed to a disease that went unrecognised for centuries, or one created through a combination of medicalising behaviour

and the harmful effects of long-term institutionalisation.⁶ Some even go so far as to label it a condition of modernity (Sass, 1992).

Where, then, does one begin? The word 'schizophrenia' has barely enjoyed its centenary. But as common sense dictates, one does not coin a term and then look around for a meaning – a new concept usually precedes a new word, generated out of necessity. Neale & Oltmanns (1980) locate the origins of the idea in the early 1800s. "At that time, spurred by advances in medicine that had resulted from a more accurate classification of diseases, the foundation for modern conceptions of schizophrenia was laid" (p.2). This was the era when psychiatry came into its own as a reputable discipline – and it was in Germany that it was first introduced as a subject at universities (Frith & Johnstone, 2003).

Throughout the 1800s, various physicians described and classified groups of patients according to similar emotional and mental symptoms and outcomes. But it was the organisation imposed by Emil Kraepelin upon these discrete notions that brought about the concept that broadly matches the modern definition of schizophrenia. His systematic classification of psychiatric disorders, published in a textbook that was revised many times during his lifetime, is the reason he has come to be regarded by most as the "father of modern psychiatry" (Neale & Oltmanns, 1980:2).

1.2.1 Kraepelin

Kraepelin grouped conditions that had been described in the 19th century, such as dementia paranoides, catatonia and hebephrenia, under the existing term 'dementia praecox'. Although he was never completely satisfied with the name,⁷ it captured the "progressive intellectual deterioration" (dementia) and the "early onset" (praecox) of the disorder (*ibid.*, p.3). He also recognised that although there were enough similarities to group these patients under one

⁶ This debate is by no means insignificant. As Shorter (1997:63) notes: "The stakes are high because the debate is really asking, do the origins of psychiatry lie in the manufacture of illness for reasons of professional gain, or do they lie in caring for a flood of patients afflicted with historically new diseases?"

⁷ This is apparent in the very first chapter of *Dementia Praecox* (1919), the English translation of the section on Dementia Praecox in Kraepelin's *Psychiatry*, where he muses "If therefore the name which is in dispute, even though it has been already fairly generally adopted, is to be replaced by another, it is to be hoped that it will not too soon share the fate of so many names of the kind, and of dementia praecox itself in giving a view of the nature of the disease which will turn out to be doubtful or wrong" (p.4). He goes on to list all the names proposed at the time – curiously Bleuler's 'schizophrenia' is last – followed by the concluding sentence, "It remains to be seen how far one or other of these names will be adopted" (*ibid.*).

label, it was necessary to distinguish subtypes: paranoid (marked by delusions), catatonic (marked by motor dysfunction) and hebephrenic (marked by emotional incongruity). At Bleuler's (to whom we shall come in a moment) suggestion, Kraepelin later added the simple subtype, where no symptom dominates (*ibid.*).

Kraepelin's contribution to our knowledge of the disease was largely descriptive; although he believed the cause to be physiological, and his focus was brain pathology, he was aware that he lacked the empirical evidence to speculate about etiology (Neale & Oltmanns, 1980; Frith & Johnstone, 2003). He identified the cardinal symptoms as: "auditory and tactile hallucinations, delusions, incoherent speech, blunted emotions, negativism (resisting suggestions and doing the opposite), stereotyped behaviour, and lack of insight" (Frith & Johnstone, 2003:28, 30). Although a significant number of his own patients recovered (13%), he was fairly convinced of the inevitable decline of functioning in the person diagnosed with dementia praecox (*ibid.*, p.38).

1.2.2 Bleuler

It was Kraepelin's contemporary, Eugen Bleuler, who actually coined the term 'schizophrenia'. He derived it from what he saw as the quintessential feature of the disease – translated as a "loosening of associations" (Frith & Johnstone, 2003:30) or "breaking of associative threads" (Neale & Oltmanns, 1980:4) – from the Greek meaning 'split mind'.⁸ Bleuler envisioned a mind that was coming apart at the seams – not too different from Kraepelin's idea of "a peculiar destruction of the internal connections of the psychic personality" (McKenna, 2007:32).

Although Bleuler considered himself to be following in Kraepelin's footsteps, his ideas ultimately diverged quite markedly (Frith & Johnstone, 2003). They were shaped by the psychoanalytic concepts being developed by Sigmund Freud at the same time (Neale & Oltmanns, 1980). To Bleuler, the disease was not necessarily only based in neuropathology; he believed there was a strong case for exploring its psychological dimension. Indeed, as the

⁸ This also unfortunately the likely root of the misconception conflating schizophrenia with 'split personality' (the layman's term for multiple personality disorder, or what is also now known as dissociative identity disorder) – see McNally (2007).

title of his major work indicated – *Dementia Praecox, Or the Group of the Schizophrenias* (English translation, 1911[1950]) – he understood it not as a single disease, but rather a group or family of diseases with different causes and outcomes. Importantly, he was not convinced of the patient’s inevitable deterioration – an idea on which Kraepelin was more or less sold (Robbins, 1993). In this way, Bleuler’s ‘schizophrenia’ resembles the modern-day conception of a “schizophrenic syndrome...[that] is an end point for disease processes whose etiology runs the gamut from organic, to psychological, with multiple permutations and combinations of the two” (*ibid.*, p.11).

Based on this approach was another of Bleuler’s significant contributions: his distinction between fundamental and accessory symptoms. Hallucinations, delusions and catatonic posturing were relegated to the background, while associative disturbances, abnormal affectivity, ambivalence (conflicting emotions and desires), autism, and avolition (loss of will) took centre stage (Neale & Oltmanns, 1980; Robbins, 1993; Frith & Johnstone, 2003). In fact, he did not consider hallucinations or delusions at all necessary for a diagnosis of schizophrenia – this is the basis for his addition of ‘latent’ and ‘simple’ subtypes (Frith & Johnstone, 2003).

1.2.3 *Their legacy*

In the United States, Bleuler’s broader notion of schizophrenia took hold, not surprising considering the popularity the psychoanalytic tradition enjoyed there until the 1970s (Frith & Johnstone, 2003). Meanwhile in Europe, the Kraepelinian view of schizophrenia dominated, with its narrow definition of the disease and focus on brain pathology. Along with these ideas came their corresponding approaches; Americans adopted a theoretical approach, while Europeans were more concerned with description. Thus American psychiatrist Adolf Meyer pushed for a focus on the “*individual* characteristics of each patient” (Neale & Oltmanns, 1980:7; original emphasis) rather than applying an existing classificatory system wholesale, in an attempt to “treat the person as well as the disease” (Meyer, 1926/1951, Vol. 3:62 in *ibid.*). His contemporary, Harry Stack Sullivan, placed emphasis on treatment, based on the belief that deterioration was not inevitable.

A few decades later, on the other side of the Atlantic, German psychiatrist Kurt Schneider developed a list of symptoms that he considered central characteristics of the disease – these are his ‘first-rank’ symptoms. Neale & Oltmanns (1980:12) explain: “Rather than rely on the highly inferential judgements made by the reviewer, Schneider emphasized the need for a careful exploration of the specific features of the patient’s phenomenological experience.” His list of symptoms, although following the descriptive tradition, are different in that they are from the patient’s perspective, their self-reported experience.

These symptoms include: *auditory hallucinations* (audible thoughts, hearing voices conversing about the patient, or commenting on the patient’s behaviour), *somatic passivity* (a hallucination of an external force interfering with the patient’s functions), *disturbed thinking* (thought withdrawal – external entity ‘sucks out’ thoughts; thought insertion – external entity inserts thoughts, or patient’s thoughts belong to external entity; thought diffusion – others have access to the patient’s thoughts, i.e. can read his/her mind), *delusional perception* (a normal “innocuous” perception is considered to have special significance); and “*made*” *feelings, impulses and volitional acts* (an external agent is imposing these on the patient) (Neale & Oltmanns 1980:12–15).

Unsurprisingly, America’s focus on the individual’s symptoms lead to the creation of more subtypes, and ultimately schizophrenia became a more inclusive diagnosis. Patients, who in Europe would have been considered borderline, or diagnosed with affective psychoses or a personality disorder, were often labelled schizophrenic in the US. These differences were highlighted by the US/UK Cross National Project, a study conducted in 1972 that compared the incidences of diagnosis in London and New York (Neale & Oltmanns, 1980; Frith & Johnstone, 2003).

1.2.4 Schizophrenia: the concept

Although the concept has remained virtually unchanged over more than a century (Robbins, 1993), it has not gone unchallenged. Differences in opinion about what schizophrenia is, and what does and doesn’t count as schizophrenia,⁹ point to a much more concerning and

⁹ For example, a modern debate only resolved in the last decade has been the existence of childhood schizophrenia (it is now agreed that the disease can occur in children) (McKenna, 2007).

fundamental debate that has raged over the decades about the validity of the construct itself. The anti-psychiatry movement (and Thomas Szasz and RD Laing in particular) was perhaps most vocal in questioning the existence of schizophrenia.

We do not accept 'schizophrenia' as being a biochemical, neurophysiological, psychological fact, and we regard it as a palpable error, in the present state of the evidence, to take it to be a fact. Nor do we assume its existence. Nor do we adopt it as a hypothesis. We propose no model of it.

[Laing & Esterson, 1970:12]

Even if one accepts its existence, as Neale and Oltmanns (1980) point out, thinking of it as a disease, or even a syndrome, is not a very useful approach. Instead, they find it most useful to identify schizophrenia as an open scientific construct: "an abstract, explanatory device or concept... which cannot be directly observed" (p.19), "an internal event or state that is inferred on the basis of symptoms and observable signs" (p.20). This is not quite the same as saying that it does not exist. For the purposes of this paper, the notion that there is something that roughly corresponds to what is called 'schizophrenia' will be accepted.

1.3 Symptoms and diagnosis

1.3.1 Symptoms

McKenna's *Schizophrenia and Related Syndromes* (2007) introduces his subject with a fairly exhaustive list of symptoms (pp.2–27) that have each, over the last century or so, been observed in studies of schizophrenics (thus they include, but also exceed, Schneider's first-rank symptoms). Admittedly, not all of these are exclusive to the disease, but all have been documented frequently enough to be considered characteristic. These include:

Abnormal ideas

These are primarily delusions, whose differing content determines a number of subcategories: delusional mood; delusions of reference, misinterpretation, misidentification; delusions of persecution; grandiose delusions (ability, identity, religious); hypochondriacal delusions; and sexual and fantastic delusions, delusional

memory, delusional confabulation. Miscellaneous abnormal ideas include partial delusions; obsessions; and overvalued ideas.

Abnormal perceptions

Auditory hallucinations: elementary/non-verbal; third person and commenting; imperative; functional;¹⁰ extracampine.¹¹

Hallucinations including the visual, somatic, olfactory and gustatory senses are also reported.

Miscellaneous others abnormal perceptions include perceptual distortions; pseudohallucinations; depersonalisation and derealisation.

Formal thought disorder

Cardinal elements: Derailment; loss of goal; incoherence; neologisms and related abnormalities; and poverty of content of speech.

Miscellaneous aspects: circumstantiality; vorbeireden (approximate answers); stilted speech; concrete thinking; and perseveration

Motor, volitional and behavioural disorders

Catatonic phenomena: simple, complex, very complex; and catatonic speech disorders

Miscellaneous: involuntary movement; lack of volition; non-specific abnormal behaviours

Emotional disorders

Affective flattening and inappropriateness: affective unresponsiveness; emotional withdrawal; inappropriate affect; shallowness, coarsening, blunting of affect; and retardation of affect

Miscellaneous: mood colourings; perplexity

¹⁰ Voices that are superimposed on or develop out of real/existing environmental noises (McKenna, 2007:10).

¹¹ Defined by McKenna (2007:10) as "hallucinations... identified by the patient as occurring outside the realm of normal perception".

The most obviously 'linguistic' symptoms, and which have received most attention from linguists, are those listed under 'thought disorder' – this classification should already give the reader a hint of the complexity and confusion we'll encounter in Chapter 3 surrounding research on SLB. However, speech disorder is also listed as a behavioural disorder, verbal hallucinations ('hearing voices') are by definition linguistic, and the discussion of 'abnormal ideas' can hardly be divorced from the fact that these will likely be made known through either speech or writing.

1.3.2 Grouping of symptoms

Schizophrenic symptoms, whether considered central or peripheral, primary or secondary, have come to be grouped according to a positive/negative dichotomy. This is not to be misconstrued as a value label; rather it is best understood in arithmetic terms, plus and minus. Positive symptoms are perceptions, thoughts, feelings that normal people do not experience. Negative symptoms are the absence of the perceptions, thoughts, feelings that most people experience. Thus, hallucinations and delusions are positive symptoms, while flat affect or poverty of speech would fall into the negative category (McKenna, 2007).

Although it is true that patients can exhibit any combination of symptoms, a clustering of symptoms has been documented. This is a grouping based on symptoms that often co-occur in a single patient; the presence of one predicts the likelihood of the presence of those others in the group. The groups are not, however, mutually exclusive (Frith & Johnstone, 2003). David Liddle determined three symptom clusters, which he labelled as psychomotor poverty syndrome (mostly negative symptoms like poverty of speech, affective non-responsivity, reduced spontaneous movement); disorganisational syndrome (for example, derailment in speech); and reality distortion syndrome (mostly positive symptoms like hallucinations and delusions) (McKenna, 2007:51–53).

1.3.3 Diagnosis

As the debate on whether schizophrenia should be considered single or plural would suggest, the symptoms (and outcome) of the disease are many and varied. An individual diagnosed with schizophrenia may exhibit only some of the symptoms, some of the time. There is no single symptom that occurs in every single patient who receives the diagnosis. How, then, is

it diagnosed? Currently, the four most common systems used are the St Louis Criteria, the Research Diagnostic Criteria, the World Health Organization's International Classification of Diseases, tenth revision (ICD-10), and the American Psychiatric Association's Diagnostic and Statistical Manual (DSM), now in its fourth revision (DSM-IV) (Frith & Johnstone, 2003:33).

What these have in common is their insistence on "clear evidence of psychosis (hallucinations, delusions, thought disorder), occurring currently or in the past" (*ibid.*, p.35). As an example of such a diagnostic system, a summary of the DSM-IV's five criteria that have to be met in order to warrant a diagnosis of schizophrenia, are listed:

A. Characteristic symptoms: At least two have to be present (for a significant period of time each) for at least a month: delusions, hallucinations, disorganized speech, grossly disorganized or catatonic behaviour, negative symptoms.

Note: One symptom is sufficient if delusions are bizarre, or hallucinations are of a voice keeping running commentary, or voices conversing.

B. Social/occupational dysfunction: For a significant portion of time since the onset of the disturbance, one or more major areas of functioning such as work, interpersonal relationships, or self-care are markedly below the level achieved prior to onset.

C. Duration: Continuous signs of disturbance persist for at least six months, including one month of Criterion A symptoms.

D. Exclusion of mood disorders: No major episodes of depression or elation have occurred concurrently with the psychotic symptoms.

E. Exclusion of known organic causes: The disturbance is not due to the effect of drugs or a known brain disorder.

[adapted from Frith & Johnstone, 2003:34]

As one can see from the list of characteristic symptoms, Schneider's first-rank symptoms are quite prominent. However, this is not his most visible influence on diagnosis today. The Present State Examination, as the name suggests, only takes into account current symptoms, with no reference to duration, history or social functioning. A diagnosis of schizophrenia is based on the presence of what are essentially Schneider's nuclear symptoms, those symptoms that he believed would accurately confirm schizophrenia, once organic brain disease had been ruled out (Frith & Johnstone, 2003). Thus this diagnostic system excludes disorganised speech, and most negative symptoms – these are the secondary symptoms to be relied upon only when primary symptoms are not present.

1.4 Causes

Theories of causation have come and gone, but no single hypothesis has managed to gather enough evidence to definitively lay the issue to rest. Apart from brain pathology, first put forward by Kraepelin, numerous possible environmental sources have been proposed and investigated.

1.4.1 Genetics

One of the enduring puzzles of schizophrenia is why, evolutionarily speaking, it persists in the population at a relatively consistent incidence. Sufferers of the disease are more likely to die young, and less likely to produce offspring – so why hasn't this rooted the disease out of the human gene pool? This paradox has prompted some researchers to postulate its genetic link to an adaptive trait that all humans share, one that is considered by many to be distinctly human – the capacity for language. Crow (1997) maintains that schizophrenia is 'the price we pay for language'; that which enables our linguistic ability has a component that can (in a small percentage of the population) go horribly wrong. Interestingly, this theory is not primarily motivated by the phenomenon of disorganised speech, but does use the symptom to bolster its position, as shall be discussed in Chapter 3. Twin and adoption studies have demonstrated a clear genetic component to schizophrenia. However, genetics only indicate a predisposition, not inevitable fate. So what other factors come into play?

1.4.2 The knocks of life

Although stress has been researched quite thoroughly in connection with the onset of acute episode of schizophrenia, “the findings are suggestive rather than conclusive” (Frith & Johnstone, 2003: 110). The findings for the effects of some recreational drugs are more solid – cannabis use is now thought to increase the risk for those already genetically predisposed to schizophrenia (Frith & Johnstone, 2003).

Probably one of the most curious, yet firmly established, facts concerning schizophrenia is that significantly more people diagnosed with schizophrenia were born during winter. This suggests a seasonal, potentially disease-causing agent that may damage the foetus in some way. Maternal exposure to influenza during pregnancy also seems to be linked to a higher incidence of schizophrenia of their babies on reaching adulthood (Frith & Johnstone, 2003).

1.4.3 Society and the family

In a radical departure from the etiology proposed so far, the anti-psychiatry movement,¹² located the cause solely in the interpersonal, or social realm. In fact, Laing went so far as to say that schizophrenia is a sane response to an insane society – there is nothing medically wrong with schizophrenics. However, his theories, as well as earlier theories such as Bateson’s double-bind hypothesis (in which a child is reared in a family environment where they constantly receive mixed messages of love and hate), and the schizophrenogenic mother, proposed by Fromm-Reichmann, have not stood up to scientific testing (Frith & Johnstone, 2003).

A related claim is that the impoverished environment, and even prison-like practices, of asylums were to blame for most of the symptoms prevalent among so-called schizophrenics. In other words, institutionalisation made patients worse, not better (Shorter, 1997). Research suggests that institutionalisation may impair cognitive functioning, in schizophrenics and other patients with mental illness. However, the classic positive and negative symptoms of

¹² This is a somewhat problematic term, in that history has lumped together a number of theorists under one label – theorists who even at the time resisted the association, and disagreed with each other. Laing in particular was opposed to this label.

schizophrenia are equally prevalent among schizophrenics who have received long-term in-patient care, and those who have not (Frith & Johnstone, 2003).

Such determinedly non-biological claims were perhaps easier to believe before techniques such as brain imaging enabled the observation of brain structure and functioning in the live patient, rather than waiting till autopsy. Modern technology has provided sufficient evidence that there is something different in the brains of schizophrenics.

1.4.4 Brain

The overwhelming success of neuroleptics (medication that acts on a neurochemical level) suggest that the neurotransmitter dopamine is involved. This 'dopamine hypothesis' surfaced in the 1960s, and states, briefly, that an excess of dopamine in the brain is responsible for schizophrenic symptoms. However, the evidence, although strong, is circumstantial. No one knows for sure how or why an excess of dopamine would cause these symptoms (Frith & Johnstone, 2003; McKenna, 2007).

Another observation that has been repeated often enough is that the brains of schizophrenics generally have larger ventricles (the fluid-filled 'spaces' in the brain). There is an overall reduction in brain size, with the regions most affected being the temporal lobes, the amygdala (concerned with emotion) and the hippocampus (concerned with long-term memory). Functional imaging suggests reduced activity in the frontal lobes of schizophrenics. These differences, although well-documented, are descriptive – not explanatory (Frith & Johnstone, 2003). Are these causal, or symptomatic of some other process of the disease?

Even though mainstream thinking on the disease agrees that it is biologically based, located in the brain, the burden of proof rests on these researchers to demonstrate the link between the symptoms observed and any brain activity or structure that can be measured by modern technology. As McKenna (2007:136) puts it:

Accepting a biological basis for schizophrenia still leaves an explanatory gap; it is not readily apparent how an abnormality in brain structure or function might become translated into the many and varied symptoms of the disorder,

most if not all of which are quite different from the usual signs of brain disease, not to mention being prone to erratic fluctuations in a way not at all reminiscent of neurological disorders.

And while progress is being made, the research is still in its infancy.

1.5 Treatment

Schizophrenia, to date, has no cure. What treatment exists, focuses on reducing the symptoms. For some people with schizophrenia, this is sufficient to live a near-to-normal life; for others, it improves functioning, but they never return to their pre-onset quality of life. And finally, some chronic sufferers are resistant to treatment and require lifelong institutionalisation.

1.5.1 The early years

Despite gloomy prospects predicted for all patients receiving the diagnosis of schizophrenia, especially by those in the Kraepelinian school of thought, there were still early attempts at treatment or cures. Until the introduction of antipsychotic medication in the early 1950s, barbiturate-induced sleep therapy, insulin coma therapy, prefrontal lobotomies, and electroconvulsive therapy (ECT) were the usual approaches (Robbins, 1986). That is not to say that the arrival of antipsychotics banished these methods; however, attempts to prove to the sceptics the efficacy of these neuroleptic drugs, over and above existing treatments, encouraged controlled studies – which soon revealed the latter's inefficacy.

1.5.2 Drugs

Neuroleptics, the first one of note being chlorpromazine, produced amazing results. Unfortunately, like other pre-drugs treatments, the early antipsychotic medications had negative side-effects, often causing lasting damage. Particularly common were the Parkinson's disease-like motor disturbances that developed, which came to be known as tardive dyskinesia¹³ (Shorter, 1997). In the 1980s, a new group of antipsychotics was

¹³ The reason for this is that these drugs work by blocking dopamine receptors (more specifically, the D2 receptors) in the brain. Parkinson's disease, characterised by motor problems, is caused by a dopamine deficiency – thus the treatment induced similar symptoms in the schizophrenic patients treated with this neuroleptic (Frith & Johnstone, 2003).

introduced, offering real hope to sufferers. Known as atypicals, these appear to have all of the benefits of earlier drugs, with none of the motor side-effects (Frith & Johnstone, 2003).

1.5.3 Psychotherapy

Apart from these somatic approaches, treatment attempts have included forms of psychotherapy, such as psychoanalysis and more recently cognitive behavioural therapy. There is very little evidence for the efficacy of psychoanalysis (Robbins, 1993), although there are individual schizophrenics, like Elyn Saks (2007) who attribute their ability to cope in no small way to this form of treatment. The official position¹⁴ seems to be that it is almost certain that psychotherapy on its own will not be effective, but in conjunction with neuroleptic medication, may play a supportive role in rehabilitation (Shorter, 1997). Cognitive behavioural therapy has enjoyed some success. Essentially, it forces the patient to focus on their thoughts, rather than their feelings, and to use logic to deal with their delusional perceptions, for example. When successful, patients can recognise these unusual thoughts as unreasonable, and stop them from developing into full-blown psychosis (McKenna, 2007).

1.5.4 De-institutionalisation

It was the early forms of treatment, such as ECT and lobotomies, and the poor condition of asylums which anti-psychiatrists like Laing so opposed – he experienced them as barbaric and inhumane.¹⁵ It was these that inspired his mission to reform psychiatry and prompted his alternative approaches, such as psychotherapy and a move away from asylum-type institutionalisation, towards a community-living arrangement. Since he made no attempt to validate his claims and methods scientifically, it is very difficult to assess the efficacy of what he proposed.

Ironically, it was the introduction of antipsychotic medication that really kick-started the release of patients from institutions. Community-based living was not the brainchild of the anti-psychiatry movement. However, one gets the sense that its popularity was motivated by economic reasons rather than humanitarian aims. Without adequate support systems in place,

¹⁴ There are those that disagree – see Bentall (2003).

¹⁵ See Mullan (1995:261–262).

many psychiatric patients ended up on the streets – ‘managed care’ can hardly be called an unqualified success (Shorter, 1997).

1.6 Conclusion

This brief overview of schizophrenia leaves one with mixed impressions. While treatment has clearly improved since the first descriptions of the disease, there still seem to be so many areas of uncertainty, that it is hard not to entertain some doubts about the concept’s validity. It is also difficult to ignore the political nature of trends in psychiatry. As Shorter (1997) notes, psychiatry has a vested interest in schizophrenia – it is the mainstay of the discipline. As such, the history of schizophrenia is also a history of modern psychiatry. A disease of the soul or mind became concretised as a disease of the brain, allowing the discipline to establish itself as a respected science. Ironically, as psychiatry found the exact biological causes of mental illness, they would ‘lose’ those diseases to the relevant medical field, such as neurology. Schizophrenia has to a degree resisted this transfer. Instead it is shared by an ever-increasing number of fields – the likes of neurology, biochemistry, psychology, speech and language pathology, linguistics.

Integrational linguistics’ interest in schizophrenia goes beyond the obviously linguistic symptoms. For the history of psychiatry enjoys parallels with the history of linguistics: the almost symbiotic relationship between psychiatry and schizophrenia is not too dissimilar from the relationship between linguistics and language. The drive for scientific status and autonomy have shaped the course of both, and determined how they have constituted, even ‘created’ their subject. As Joseph, Love & Taylor (2001a:viii) note, citing Foucault, “in all fields of intellectual inquiry – although perhaps in language inquiry more than most – issues of disciplinary territoriality have often been regarded as inseparable from the inquiry itself”. That this is true of linguistics is one of the driving arguments of the following chapter.

2. CRITICAL LINGUISTICS

2.1 Introduction

Newmeyer (1987) locates the beginnings of modern linguistics in the late 1700s, when the discovery of ancient texts and exotic foreign languages (due to colonial expansion) ultimately gave birth to comparative linguistics. Others consider Ferdinand de Saussure – who “free[d] language studies from the tyranny of the historian” (Harris, 1981:46) to establish linguistics as a science in its own right – to be the ‘father of modern linguistics’, which would push the inception of the discipline to a century later. However, it was only in the mid-twentieth century that linguistics was afforded autonomy within academic institutions, separate from literature departments (Newmeyer, 1987). Nevertheless, linguistics is a discipline whose relatively rapid transformation from a side-show to historical studies, to an established field spawning a legion of sub-disciplines and having wide-ranging influence beyond its (contested) scope, particularly in the flourishing cognitive sciences, is enough to leave one breathless.

There is no doubt that Noam Chomsky helped put linguistics on the map in the 1960s.¹⁶ But it was a very particular linguistics; like Saussure before him, he aimed not only to contribute to the discipline, but to (re)define it, by determining what is, and what is not, the business of linguists. As Love (2009:31, citing Harpham, 2006) comments, this – what amounts to successive redefinitions of ‘language’ – is a common thread running through the history of linguistic thought. Prompted in part by the shortfalls of Chomskyan generativism that soon became apparent, a recent criticism of the state of the discipline emerged in the early 1980s. But it was not merely a reaction against the trend of the day; it had in its crosshairs the much more deep seated origins of the discipline. Leading the charge was Roy Harris, then the Chair of General Linguistics at Oxford (Taylor, 1997). Harris (1981) had the audacity to call into question the very assumptions on which linguistics is based – and by implication, the aims, scope and methods of the discipline. These assumptions he collectively labelled ‘the language myth’, claiming that the entity we have come to characterise as ‘a language’ is more fallacy than fact. Effectively what he was calling for was (and still is) a “linguistics without

¹⁶ Indeed, Harpham (2006) notes that Saussure’s enduring influence has been *outside* the discipline.

languages” (Joseph, Love & Taylor, 2001b:203). While this may seem like the academic equivalent of going out on a limb, and then proceeding to saw it off, his revolutionary project was, if flawed, not as self-contradictory as it sounds. It is not to say that English or Polish or Afrikaans don’t exist at all, but rather that they don’t exist in the form of the “‘determinate or determinable’ objects that ‘orthodox modern linguistics’ calls languages and takes itself to be describing” (p.204). These are second-order abstractions from the reality of experience.

Ultimately, what he is criticising is the artificial segregation and privileging of certain aspects of human communicational activity over others. Harris’ proposed alternative to orthodox ‘segregationist’ linguistics is ‘integrational linguistics’, a lay-oriented approach focused on actual linguistic experience, rather than idealised abstractions, with the implication that, by definition, these idealised abstractions have little validity. While in thirty years, he may not have eradicated orthodox linguistics (and indeed the question as to why such a damning critique can be happily ignored by mainstream linguistics is not without significance¹⁷), he has certainly succeeded in winning followers; his students have expanded upon his ideas (although as a prolific writer, Harris has certainly expanded upon them himself). The work of two such theorists, Michael Toolan and Talbot Taylor, will be used here to supplement the Harrisian overview of integrational linguistics, due to their focus on characteristics of language that have particular relevance to research into SLB.

While Harris calls for a wholesale overhaul of orthodox linguistics, other integrationists are a little more circumspect in their aims. Toolan in *Total Speech: An Integrational Approach to Language* (1996), like Harris, defines his task against the backdrop of segregationist linguistic analysis and fixed-code theories “to show the inadequacies of any thoroughgoing adoption and application of those principles” (pp.2–3). He feels it is important to understand that these principles are derived from “certain ideas that are useful as simplifying aids to such pragmatic tasks as translation and language teaching” (thus recognizing a little more overtly the important ways these second-order constructions are woven into our first-order

¹⁷ Taylor (1997 – see below) at least is of the opinion that the flaw against which integrationists do battle is too deep seated to eradicate.

experience), but that when they “are recast as unquestionable foundational axioms” (*ibid.*) a warped notion of language begins to take shape.

Taylor (1997), too, both extends and critiques his mentor’s work. He identifies the core error in thinking about language as being encapsulated by the *principle of intersubjectivity*, so called because it represents language as a resource that allows speakers to share something which is essentially subjective. His investigations into language are driven by questioning the recurrent nature of topics and problems within Western linguistic thought. Instead of real progress, he identifies similar arguments, with similar solutions, based on similar taken-for-granted assumptions, leaving him to question whether the pet problems that have been pored over for centuries by their very nature prevent solution.

While Taylor acknowledges the credibility of Harris’ suggestion that the irresistible force shaping the lines of thinking about language are to be found in “the literate and intellectual practices which characterize the development of Western culture” (1997:7–8), he senses that this alone is not sufficient to explain the phenomenon. As far as Taylor is concerned, no amount of evidence pointing out the flaws in the ‘language myth’ will be effective; rational argument will not win in a battle against what is essentially a deeply held belief.¹⁸

Naturally, Harris’ critique is culturally and philosophically situated in a particular history of ideas; while his work is original, he certainly didn’t snatch it out of the ether (one criticism of his work is that he presents it as such – see Joseph, 2003:25). Post-structuralist theories surely help prepare the way for such radical criticism, that turns in upon and deconstructs its own discipline’s foundations, and Joseph (2003) notes clear connections between Harris and Derrida on the topic of writing. Influences may be found even further back, if we consider Per Linell’s (2005) assertion that all thinking about language is either essentially Cartesian (monological) or Hegelian (dialogical); Harris would be associated with the latter. Linell explains these two approaches, respectively, as

¹⁸ In fact, in *Mutual Misunderstanding* (1992), Taylor effectively argues that the communicational sceptic’s rhetorical manoeuvres mirror those of whom he is criticising – for Joseph (2003), ‘the sceptic’ is “at times a thinly disguised version of Harris” (p.101).

- a) languages as structured sets of forms, used to represent things in the world
 - b) language as meaningful actions and cultural practices, interventions in the world
- [Linell, 2005:4]

Linell (2005) also situates himself within the dialogical tradition – quite explicitly: he calls his approach ‘dialogism’. His theories are included in this overview because they also, to a degree, mount a critique of the discipline as a whole, in claiming that a pervasive bias towards written language underlies much of what it claims about language in general. He notes that a written language bias is not only to be found in linguistics, but in other fields of study as well. The shared perspective can partly be explained by shared background; he locates the foundation underlying much of the written language bias in Cartesian dualism, the source of many of the dichotomies that Western thinkers have been grappling with for centuries: individual vs. society; structure vs. actor; language vs. speaker. Various theories have assigned primacy to one half of each of the pairs; all of these theories are monologicistic. Relevant to our purposes here, he earmarks psychology as one such monologism-dominated field (Linell, 2007). Dialogism – to which Linell subscribes – acknowledges the analytical utility of these distinctions, but cautions that they should not be treated as autonomous entities. Rather, their interdependency and intersubjectivity should also be recognised. What it amounts to is a “reverse [of] the focus-background relationships from the structure-in-focus view to a dynamics-in-focus view” (2005:223, emphasis omitted). Thus, for Linell, ‘applied sociolinguistics’ is more foundational than the abstract, ‘pure’ linguistics on which it is supposedly based.

Linell acknowledges a number of theories and approaches that share features with dialogism, and which in some way or other oppose the monological stance embodied by Chomskyan generativists, such as radical constructionism, ethnomethodology, conversation analysis, and even integrational linguistics. Dialogism attempts to address what Linell sees as these theories’ flawed approach in focusing too much on either situated interactions or the situation-transcending structured knowledge, and disregarding the influence of the theorist. Rejecting both ‘abstract objectivism’ and pure subjectivism, “it stresses the embeddedness [in culture] and embodiment of language” (p.214), which amounts to what Linell calls

“intersubjectivism” (p.215): it is always located ‘between’, rather than ‘out there’ or ‘in here’. Dialogism invokes a “‘double dialogicality’ (Linell, 1998a: 54 [cited]) of discourse, action and cognition...[in which] utterances are creatively and dialogically accomplished” (p.216) in both a situational and a sociocultural context.

Although Linell clearly distances himself from integrational linguistics (or rather, Roy Harris’ version of it¹⁹) it is my opinion that the two approaches’ conclusions have more in common than either of their founders would like to admit. I imply no plagiarism here; merely that new approaches tend to justify their existence by emphasising their unique contribution to a field or discipline, and playing down their similarities with other approaches. Ultimately, dialogism is not that different from Taylor and Toolan’s version of integrational linguistics, but by explicitly invoking ‘dialogue’ as metaphor for broader linguistic processes, it underscores face-to-face speech as the prototypical meaning-making (unavoidably shared) activity.²⁰ Both integrational and dialogical critiques of linguistics argue that language is always situated, not abstract, and yet simultaneously recognise the origins, influence and significance of a situation-transcendent notion of language in literate culture. Thus Linell’s dialogicism expands upon one facet of integrational linguistics and simultaneously is a critique of it.

Both integrationism and dialogism can be seen in the light of a movement in the (social) sciences towards ‘embodiment’; the realisation that the entities such as mind, thought, language and so on, only have existence in actual bodies with actual brains in actual environments (it is the context in which these entities or faculties have evolved) – a defining rather than peripheral property. Thus to study them in an abstract way makes no sense at all,

¹⁹ He finds the concept of ‘language myth’ – language as a linguist’s construction – while applicable to ‘national languages’, problematic when taken to its logical conclusion (the concept of language itself is a construction, and not ‘real’). And Harris, he feels, does not make it clear how far he is willing to go. Thus, although illuminating, integrationism “runs the risk of throwing out the baby with the bathwater” (p.202) by focusing on situated interactions, and labelling anything that transcends these as mythical. Here Linell verges on throwing the baby out with the bathwater himself, in dismissing integrationism purely on the basis of Harris’ earlier theories, while largely ignoring his later refinements (for example, Harris [1998:29] explicitly acknowledges language’s macrosocial dimension, “practices *established* in the community” [emphasis added], which by definition implies it has a ‘situation-transcendent’ aspect), and those, such as Toolan, who perhaps take a less radical approach, or Taylor, who views language’s “situation-transcendent [metalinguistic] practices” (Linell, 2005:213) as a structuring exoskeleton. The publication of *Language and History: Integrationist Perspectives* (Love, 2006a) surely puts this point to rest.

²⁰ Linell (1998:13, n.14) points out in a footnote that the “Greek *dia* means ‘through, between, across’, not ‘two’”, although there are grounds to argue for a relationship with *dya-*, *di-*; others relish the (erroneous) plurality of meaning contained in the term.

for the very starting point of such a venture denies one crucial aspect of what we know to be true about the very basic nature of what is being studied. Such a venture can only fail. The tentative work seeking correspondence between distributed cognition (which falls within/overlaps with the project of embodied cognition) and integrationism will also be addressed briefly (in Section 2.12 below).

Since the ultimate aim of this overview is the application of these theories in the chapters that follow, those features of language with particular relevance (historically) to the study of SLB will enjoy greater attention. That is to say, that while this overview is detailed, it is by no means exhaustive. Nevertheless, it provides a fairly good picture of the foundations on which integrational approaches to numerous aspects of language are based.

2.2 The problem

An analysis of the 'speech circuit' formulated by Ferdinand de Saussure reveals the key characteristics of what Harris (1981) terms 'the language myth'. As we shall see, it is this belief about how a language operates that informs the belief about what a language is. The classic speech circuit runs as follows: A has a thought. A encodes thought by expressing it in words. B hears the words. B decodes the words into their corresponding thoughts. Due to the code shared by both, B's decoded thought corresponds exactly to A's original thought. For conversation to continue the process will be repeated in the inverse, i.e. B will transmit their thoughts to A, in reply.

For the sake of convenience, the speech circuit is depicted as having a beginning and an end, starting in the mind of the speaker, and ending in the mind of the hearer.²¹ Thus communication is conceived of as a transfer or exchange of thoughts. For communication to be successful, speaker and hearer must share a code, and this code must be fixed and bounded. This code consists of word-meaning pairs, or more technically, form-concept pairs. The processes of coding and decoding entail matching up meanings with words, and words

²¹ However, the heuristic value of having such limits soon gives way to factual status. The ideal utterance event does not allow for interruption, simultaneous speaking, feedback. It must start with a fully formed thought, and its end is signalled by a fully formed thought (that matches the original thought). In other words, "Saussure's identification of the initial and terminal points in the chain" effectively "begs questions the integrationist would wish to open up" (Harris, 1995:22).

with meanings, respectively. This code, then, is what we call a language, and speech is an expression of it. Speech is the transfer of ideas between people of a shared speech community, by means of the vehicle of words (Harris, 1981; 1995; 1998).

So far so good; the description above ties in with the average person's commonsense understanding about how a language works (and thus what a language is). What exactly is mythical about it? The answer, according to Harris (1981), is, well, everything. The classic speech circuit encapsulates the "two interconnected fallacies" (p.9) that constitute the language myth: "The telementational fallacy is a thesis about the function of language, while the determinacy fallacy is a thesis about the mechanism of language" (*ibid.*). The idea that knowing a language is a case of "knowing which words stand for which ideas" (*ibid.*) – i.e. having a sort of mental dictionary – is the telementational fallacy. The idea that communication is a result of all people (who speak the same language) sharing this mental dictionary – i.e. a language is a fixed code which speakers know and share – is the determinacy fallacy.

Harris continues:

Stated in a slightly more abstract way, the language myth assumes that a language is a finite set of rules generating an infinite set of pairs, of which one member is a sound-sequence or a sequence of written characters, and the other is its meaning; and that it is knowledge of such rules which unites individuals into linguistic communities able to exchange thoughts with one another in accordance with a prearranged plan determined by those rules. [p.11]

Thus a belief about what languages are is superimposed upon the experience of the individual communicator (Love, 2009). Not only does this fit quite nicely with the commonsense notion of what a language is and how it works – it is reflected in our ways of talking about language – but *that* this is the commonsense view is testament to the all-pervasive influence of the language myth. For in spite of our ubiquitous experiences of misunderstanding and ambiguity in speech ("code failures"), the existence of dictionaries and

grammar books seems to prove the validity of this version of the nature of this entity we call a language.

Furthermore, our everyday interactions bear this out. We treat questions such as ‘What did you say?’, ‘How many words are there in the following sentence?’ and ‘What does *filigree* mean?’ as valid and meaningful utterances, to which we can provide answers. These reflexive practices regarding our own language use seem to confirm that language is a concrete, established entity, consisting of words and their meanings, and that there is a clear distinction between what is (or counts as) language and what is (or does) not.

The mythical nature of the language beast starts to emerge here, in our metalinguistic practices: that some of our metalinguistic experiences are ignored as irrelevant, ascribed to extralinguistic factors (misunderstanding, ambiguity), while others are privileged and used as the model of ‘normal’ experience by mainstream linguistics, should raise a few questions among the critically minded. Metalinguistic practices play no small part in upholding our erroneous assumptions about languages, and Taylor in particular elaborates on the relationship between the two (see Section 2.5). But first let us qualify the various assertions that have been made thus far about orthodox linguistics’ position on the matter.

In this traditional view, “the entire situational and interpersonal context of language is omitted from consideration” (p.34). As a fixed, systematic code, any variance between two instances of the conveyance of the ‘same’ message must be excluded from the definition of a language. Harris calls this the “invariance condition” (p.88). Traditional linguistics doesn’t *deny* that context affects interpretation, rather it denies that dealing with these extraneous features is the proper job of linguists. “A language in their view is to be treated as a system of decontextualised verbal signs, organized into complexes called ‘sentences’, and mastery of a language is interpreted as mastery of the decontextualised system” (p.32). This idealisation is considered necessary for a scientific study of language.

Like Harris, Linell criticises the way linguistics, in an attempt to be scientific, has ended up creating its object of study rather than describing or investigating something that exists. He calls the abstraction of language from ‘linguaging’ (i.e. product from activity) a process of

“splitting and inversion” (2005:9), in which dialogical practices are transformed into cases of ‘language use’. First, the activity of language is split into structure and process; the structure is then separated out as an autonomous object, which takes priority (the inversion); in this new hierarchy, communication activities are described in terms of the invariable structure applied in various contexts.

2.3 The solution

To counteract the language myth, Harris (1981) proposes an approach called ‘integrational linguistics’, which seeks to make sense of linguistic experience from the point of view of people using language, and provide an “inward” account (Toolan, 1996:22). In other words, it proposes to be a ‘lay linguistics’; one that “derive[s] its basic concepts from the first-order communicational experience of lay members of the community” (Harris, 2006:714). For Taylor, in particular, this includes the ordinary everyday ways of how we speak about and make sense of language and communication (see Joseph, 2003).

Here, language is understood as “a process of making communicational sense of verbal behaviour” (Harris, 1981:165). It cannot be divorced from an understanding of what is considered ‘rational’ – the layperson’s “everyday assumptions concerning the total behaviour of a reasonable person” (*ibid.*). It is driven by the ‘non-compartmentalisation principle’: the communicational space is not divided up into language and non-language. Nor do language users possess or employ two sets of knowledge – language and how it is to be used – but this is one and the same: knowing language is knowing how to integrate it.

It is this insight that motivates Toolan’s challenge to the distinction between ‘text’ and ‘context’, arguing that this is never given in advance of a particular situation, and therefore not fixed. “Context is both indispensable to our making sense of language and shockingly, liberatingly variable; it is only locally determinate, as occasions of communication arise” (1996:4). Furthermore, to speak of ‘context’ as an entity is already to reify it; rather, integrationists argue that “there is only the activity of contextualizing” (*ibid.*) – crucial to meaning making, but constantly being negotiated.

Thus integrational linguistics is concerned with “analys[ing] how questions of semantic indeterminacy arise in communicational interaction, and what linguistic techniques are in fact employed by participants to resolve the difficulties involved” (Harris, 1981:188). Harris uses the metaphor of driving a car in traffic: the repeated adjustments in response to other motorists on the road that are required for getting to one’s destination. So too, do we as communicational participants ‘give each other room’, both verbally and non-verbally.

Ultimately what Harris is calling for is a completely new approach, not an addendum to traditional lines of argument. For the integrationist, communication is not the transmission or reception of messages between speaker and hearer, or the transmission of *anything* really. Communication is the “integration of activities” (Harris, 1998:29). As such, it is the most basic of human ‘programmes’; one’s continued existence depends on integrating one’s own activities with each other, and with those of others. By foregrounding communication, integrationists deny language’s privileged position, turning traditional linguistics on its head: “[l]anguages presuppose communication” (p.5).

Three factors govern human communication:

- Biomechanical: physical and mental capacities of the human being
- Macrosocial: practices established in the community or some group within the community
- Circumstantial: the specifics of particular situations

[adapted from Harris 1998:29]

Although listed separately, in any given communication interaction, all three will be integrated. While the ‘biomechanical’ realm may seem the most familiar to orthodox linguistics, integrationists caution that this does *not* invoke a faculty dedicated to language – it extends far beyond a single mental module. Rather “the foundational requirements and characteristics of language using are quite general ones and that human language does not crucially rest on specific and language-exclusive mental faculties and mechanisms” (Toolan, 1996:10). Fleshing out of Harris’ assertion that ‘languages presuppose communication’, Toolan argues that the existence of human language is made possible by the more general

attributes of “faith; trust; orientedness to others; faculties of memory and imagination; goal orientedness; and the ability to perceive the relatedness and non-relatedness of phenomena (understood as the perception of similarity and difference rather than of identity and difference)” (pp.11–12). The terms ‘other-oriented’, ‘faith’ and ‘trust’ (which evoke Harris’s ‘giving each other room’) are perhaps misleading; language interaction is not always the philanthropic give-and-take these terms suggest. Toolan is, however, keenly aware of the political nature of language and meaning making. In fact, he points out that

although language is never a code, nevertheless it is quite apparent that individuals and groups – especially subordinated and disempowered ones, although here the issue of what constitutes subordination must not be prejudged – may be habituated to a code-like predictability of usage, forms, and meanings. [p.18]

Slightly less radical, Toolan’s challenge to orthodox linguistics calls for “a revised application of extant methods” (1996:22). Integrational linguistics is thus “a principle rather than a method” (p.23) that defines rather than obscures its initial assumptions for any investigation into language. For Toolan (p.9), this starting point is encapsulated in four central tenets:

- a) the principle of cotemporality
- b) the privileging of local relevance
- c) the sequentiality of linguistic production
- d) the uniqueness of experience

In other words, language is always situated in the here and now, and is bound up in, and makes reference to, what surrounds it in both time and space. The first tenet employs a term coined by Harris (1981) to describe the fact that “[l]inguistic acts are assumed to be immediately relevant to the current situation, unless there is reason to suppose otherwise, just as non-linguistic acts are” (p.157). Even then, these ‘reasons to suppose otherwise’, whether marked linguistically or extralinguistically, will form part of the immediate temporal context for the language. Cotemporality’s significance should not be underestimated.

Thus integrational linguistics is concerned with “analys[ing] how questions of semantic indeterminacy arise in communicational interaction, and what linguistic techniques are in fact employed by participants to resolve the difficulties involved” (Harris, 1981:188). Harris uses the metaphor of driving a car in traffic: the repeated adjustments in response to other motorists on the road that are required for getting to one’s destination. So too, do we as communicational participants ‘give each other room’, both verbally and non-verbally.

Ultimately what Harris is calling for is a completely new approach, not an addendum to traditional lines of argument. For the integrationist, communication is not the transmission or reception of messages between speaker and hearer, or the transmission of *anything* really. Communication is the “integration of activities” (Harris, 1998:29). As such, it is the most basic of human ‘programmes’; one’s continued existence depends on integrating one’s own activities with each other, and with those of others. By foregrounding communication, integrationists deny language’s privileged position, turning traditional linguistics on its head: “[l]anguages presuppose communication” (p.5).

Three factors govern human communication:

- Biomechanical: physical and mental capacities of the human being
- Macrosocial: practices established in the community or some group within the community
- Circumstantial: the specifics of particular situations

[adapted from Harris 1998:29]

Although listed separately, in any given communication interaction, all three will be integrated. While the ‘biomechanical’ realm may seem the most familiar to orthodox linguistics, integrationists caution that this does *not* invoke a faculty dedicated to language – it extends far beyond a single mental module. Rather, “the foundational requirements and characteristics of language using are quite general ones and... human language does not crucially rest on specific and language-exclusive mental faculties and mechanisms” (Toolan, 1996:10). Fleshing out Harris’ assertion that ‘languages presuppose communication’, Toolan argues that the existence of human language is made possible by the more general attributes

of “faith; trust; orientedness to others; faculties of memory and imagination; goal orientedness; and the ability to perceive the relatedness and non-relatedness of phenomena (understood as the perception of similarity and difference rather than of identity and difference)” (pp.11–12). The terms ‘other-oriented’, ‘faith’ and ‘trust’ (which evoke Harris’s ‘giving each other room’) are perhaps misleading; language interaction is not always the philanthropic give-and-take these terms suggest. Toolan is, however, keenly aware of the political nature of language and meaning making. In fact, he points out that

although language is never a code, nevertheless it is quite apparent that individuals and groups – especially subordinated and disempowered ones, although here the issue of what constitutes subordination must not be prejudged – may be habituated to a code-like predictability of usage, forms, and meanings. [p.18]

Slightly less radical, Toolan’s challenge to orthodox linguistics calls for “a revised application of extant methods” (1996:22). Integrational linguistics is thus “a principle rather than a method” (p.23) that defines rather than obscures its initial assumptions for any investigation into language. For Toolan (p.9), this starting point is encapsulated in four central tenets:

- a) the principle of coterporality
- b) the privileging of local relevance
- c) the sequentiality of linguistic production
- d) the uniqueness of experience

In other words, language is always situated in the here and now, and is bound up in, and makes reference to, what surrounds it in both time and space. The first tenet employs a term coined by Harris (1981) to describe the fact that “[l]inguistic acts are assumed to be immediately relevant to the current situation, unless there is reason to suppose otherwise, just as non-linguistic acts are” (p.157). Even then, these ‘reasons to suppose otherwise’, whether marked linguistically or extralinguistically, will form part of the immediate temporal context for the language. Coterporality’s significance should not be underestimated.

According to Harris, it is

the ultimate basis of the distinctions we feel obliged to draw in order to deal metalinguistically with a whole range of so-called ‘type-token’ ambiguities, and is also intrinsic to our understanding of such everyday notions as asking question, stating facts, and giving instructions. [1981:157]

He emphasises that stressing the importance of coterporality does not equate to a denial of ‘displacement’, language’s much-celebrated power to refer to events or objects remote in time and place. Rather, “acknowledgement of coterporality as central to our experience of language is what alone makes possible any convincing explanation of how displacement works” (p.158). Coterporality has to be explicitly “suspend[ed] or neutralise[d]” (*ibid.*) for displacement to be allowed.

Beyond the immediate concerns of linguistics, coterporality touches the very core of what it means to be human: “[t]he principle of chronological integration between linguistic and non-linguistic events plays an important part in our picture of human rationality” (p.157). (As Eugen Bleuler [1950(1911)] remarked of his schizophrenic patients, “[c]ausality frequently does not seem to exist for them” [p.82] – an event could be explained as being caused by something that occurs afterwards.) The integrational linguistic approach to rationality will be discussed more extensively below (Section 2.13); we now proceed to a detailed breakdown of how integrational linguistic thought challenges what have traditionally been hailed as core features or properties of language.

2.4 Linguistic knowledge

Modern linguistic theory, in its psychologistic – Saussurean and Chomskyan – versions, is focused on describing “what [people] are assumed to know”, the “mental reality underlying actual behavior” (Harris, 1981:35), rather than giving an account of verbal behaviour itself – this is secondary, a manifestation of the knowledge of the language. This description takes the form of a decontextualised system of knowledge – the supposedly scientifically necessary idealisation extends to the language user, best expressed by Harris’ example of the ‘ideal speaker-hearer’ employed by generative linguists, who is defined as

a member of 'a completely homogenous speech-community, who knows its language perfectly and is unaffected by such grammatically irrelevant considerations as memory limitation, distractions, shifts of attention and interest, and errors (random or characteristic) in applying his knowledge of the language in actual performance' [Chomsky, 1965, in Harris, 1981:32–33].

Firstly, Harris (1990, in Joseph, Love & Taylor, 2001) takes issue with the notion that the 'ideal' has any part to play in explaining communication. For 'idealisation', either in the sense in which it is used in science (for the purpose of calculation – i.e. it has a practical application), or in the humanities (as "prescriptive stereotypes"), when applied to language, speaker/hearers, or speech communities, is "a false comparison"; they "turn out to be neither one thing nor the other" but rather are merely "steps in a process of explanation" (p.206) – and not very good ones at that.

Human speakers always *are* affected by "memory limitation, distractions, shifts of attention and interest" (the notion of "errors" shall be dealt with below in Section 2.7) – these are features of, not obstacles to, human communication. There are no "homogenous" speech communities – indeed just what this means is open to speculation. And what would the criteria be for knowing one's language perfectly? Thus, Harris views this ideal speaker-hearer as being, by definition, a "communicational cripple" (1981:33) – for what he/she knows (as far as the knowledge can be considered linguistic) is completely divorced from the real ways and contexts in which language is used. In other words, it is a notion of competence that by definition would render the possessor incompetent. However, orthodox linguistics accounts for "any apparent discrepancy between linguistic behaviour and postulated language rules" (p.152) by invoking two doctrines: that of ellipsis (speakers' utterances are an abbreviated version of a form that does conform to the rules), and that of distinguishing between linguistic and contextual/pragmatic knowledge.

In combination with the doctrines of ellipsis and distinct linguistic knowledge, the invariance condition serves to exclude the creative dimension of language. As Harris cautions, "[a] language with job-secure words presupposes omniscience" (p.175). Orthodox linguistics makes it impossible to say anything that could not be generated by the code and rules of the

language (although an utterance may be an abbreviated form). Thus, it is impossible to say anything novel; it is merely contexts that have not previously been encountered.

However, as Harris proceeds to point out, these two doctrines are simultaneously the language myth's downfall which, when taken to their logical conclusion, lead to 'elliptical regress'. For if every incomplete sentence is really a shortened version of some complete, grammatically correct sentence ('what we really meant to say, if we had bothered'), we ultimately "reach a position in which all deictic expression may be treated as elliptical" (p.201), i.e. standing for something else more explicit. Using pronouns as his particular example, Harris finds that "nowhere, it seems, except in the present particulars of current situations can we find an ultimate anchorage for what it is we are talking about" (p.202).

For Harris, there can be no knowing language without knowing how it is to be used appropriately. (And this is not given in advance, although previous experience provides compelling suggestions.) Crucial, however, is the point that these are not *two* separate kinds of knowledge – linguistic 'knowledge' (if one can call it such) of linguistic 'facts' is by definition practical, not abstract, and ever shifting.

Harris's position is that the reason for invoking the concept of fixed (shared) knowledge is to explain how communication is successful. Integrationists counter the claim – how then would one explain or determine that understanding has taken place? Having both parties confirm that they have understood is not sufficient (we have surely all had experiences where someone has claimed to understand what we have said, and their subsequent behaviour suggests otherwise). Is the solution to have a theory of *what counts as* understanding (specific behaviour or verbal response), such that if certain criteria are met, we can declare understanding to have taken place? As Taylor (1997) goes through the motions of attempting to stipulate such criteria, and as his list of what these criteria depend upon grows longer and longer, it soon becomes apparent that "the justification of an understanding-claim is an organic feature of the context in which it occurs" (p.89). The speaker, in assessing whether the hearer has understood them, "does not follow any rule, but acts according to his interpretation of the interactional context" (p.90).

Thus, from the integrational perspective, what the doctrines of ellipsis and fixed knowledge really express or capture is a specific language game or practice, in which the hearer tries to make sense of what has been said. But that line or distinction is blurred, and the 'making sense' is cast as an imagined sentence that encapsulates what was actually said (or intended). The dialogue between hearer and speaker is compacted into this single sentence, outwardly expressed as the original utterance that is forced to carry the burden of both inputs. The work the hearer does is erased and simultaneously (super)imposed on the speaker. The dialogic nature is denied.

2.5 Metadiscourse

While within integrational linguistics language is firmly subordinated to human communication in general, and thus governed by the same factors (biomechanical, social, and circumstantial), there is a feature that language does not share with all communication activities – reflexivity. Reflexive language, metadiscourse, or 'language about language' is a feature of our everyday speech. However, as Taylor (1997) points out, theoretical rhetoric interprets it as descriptive; as description, metadiscourse is simultaneously taken out context, reified, and (dis)regarded as lay theorising of a matter which only professional linguists can give proper account. In the reification process, metadiscourse's practical normative function in everyday interaction is completely overlooked.

"Language users ordinarily treat linguistic acts as something they value, as something whose characteristics matter to them; and they convey – and enforce – this attitude, in large part, by speaking of language and the circumstances of its occurrence in normative and evaluative terms" (p.11). Taylor stresses that this is not to say that metadiscourse is a way of stating or referring to language rules that are predetermined by convention. Rather, normative metadiscourse has a moral and political dimension to it. It *is* the law, executed, not a description of it:

It is by means of contextually embedded instances of normative metadiscourse – rather than by 'unspoken agreements' or 'tacit conventions' – that we establish language use as a normative form of behavior and impose and

negotiate and contest the differential values and constraints that 'we' in 'our culture' place on linguistic phenomena. [p.13]

References to normative metadiscourse are not wholly absent from linguistic theory, but these usually dismiss it as "prescriptivism" (p.13). Taylor makes reference to Deborah Cameron's argument that in contrast to the "unscientific value judgments" (p.14) normative metadiscourse is usually said to amount to, it constitutes an important phenomenon for linguistic study, due to its social and political significance, and not the least because it is a central characteristic of the object linguists purport to be studying.

In fact, "concepts of correctness, relative value, and propriety are essential to the human experience of language, and of the contextual circumstances in which language is integrated" (p.16). Making normative discourse the focus of linguistics will allow theorists to get closer to the language user's experience of language. But this means theorists will have to abandon the notion that they are studying a scientific object, "independent of the voluntary acts of individuals" (*ibid.*), and acknowledge language's inherently political nature. There are some non-linguists who have already done this; Taylor lists ethnomethodologists Garfinkel and Heritage, and philosopher Wittgenstein.

But language use does appear to be patterned, ordered, predictable – in other words, structured (or "code-like" [Toolan, 1996:18, emphasis added]). Yes, says Taylor, but we need to adjust our expectations of what form that structure takes. His approach is to conceive of language as having an 'exoskeleton':

its units and the patterned relationships between them... are only misleadingly seen as properties that are *internal* to language itself, or to the interactions in which it occurs, or to the language that is being spoken, or to the language-user's mind/brain [p.18, emphasis added].

Using the analogy of measurement, Taylor illustrates his understanding of what language is, and what it is to know language. Language is a method for measuring the world, "for providing us with what we take to be precise, reliable, stable, and interpersonally uniform

characterizations of the world” (p.19) However, he cautions that this is not to embrace linguistic relativism where language ‘constructs’ the world. The measurement metaphor implies a property being measured that is independent of the action of measuring.

But there is another way in which that being measured is *not* independent – when the object to be measured by language is language itself. For it is through this measuring activity that the role of language as accurate measure is reinforced and/or renegotiated. Each language has its own terms to achieve this purpose. While there may be different terms and techniques in different languages, no language is a language without this metalanguage ‘built in’.

Clearly, being a competent speaker of a language involves a lot more than possessing a mental dictionary or grammar book, or even a phrase book that tells you which utterances are appropriate when. As Taylor puts it:

knowing language is more than a matter of being able to construct ‘well-formed’ and meaningful sentences, and more even than being able to use such sentences appropriately in particular discursive routines, or language games. For it also involves knowing how to integrate your participation in these language games into the cultural practices which we recognize as characteristic of ‘us’– of what Wittgenstein called our *form of life*. [p.21]

Thus linguistic competence is better seen as a skill, an ability, than a static body of knowledge. The result of this reformulation is that concepts such as ‘grammaticality’ get an integrational makeover as no longer “a question concerning a property of the sentence itself but rather of how we reflexively characterize it” (p.23).

Like grammaticality, other concepts brandished by linguists as analytical tools are derived from an already ‘enculturated’ language: “*already* the product of the language users’ own prior, and continually refashioned, analyses” (p.24, original emphasis). Thus, Taylor concludes, there is no first-order, immediate knowledge; rather, “*the theorist’s* analytical object will be a construct of his own ‘scientific’ metadiscursive practices, as generated by the normative

imposition of his own methodological techniques and criteria” (p.25, original emphasis). Love (2006b) regards “[o]ne of the projects of integrational linguistics [to be] to show how such second-order processes are founded in and arise out of our first-order linguistic experience” (p.17). It would seem then, however, that Taylor believes first-order linguistic experience is in principle inaccessible *as an object* to others, integrationists or no – a not illogical conclusion to draw from Harris’s theories, but not one Harris chooses to address.

Although the source of the language myth is linked to our metalinguistic practices, metalinguistic activity is clearly not erroneous in and of itself. It is the unquestioned application of these practices to a science of language that is the problem.

What has often happened in the history of linguistic and logical theorizing is that some of these derived distinctions and notions have been accorded a quasi-axiomatic status which cuts them off from their experiential basis. Consequently, all kinds of academic enigmas have been generated which serve to obscure that experiential basis still further, and lead even to refusal to recognise it.

[Harris, 1981:157]

Harris locates the origins of the myth in post-Renaissance normative accounts of language, written by those who were attempting to give some direction to speakers and writers in avoiding ambiguity and improving clear communication. These normative accounts – enshrined in dictionaries and grammar books – have subtly shifted over time to being taken as ontological accounts of what language actually is. Thus we are still left, for example, with the eighteenth century grammarian’s legacy of the “tripartite organisation of language description[]” (p.57): phonetics, lexicon, grammar. Harris points to the difficulty (despite the apparent effortlessness) of making these old grammatical categories fit within modern linguistics, without a generous allowance for ‘fuzziness’.

That may be the immediate basis for our concept of ‘grammaticality’, but there is an even deeper set of beliefs and practices that underlie this. Harris finds evidence of the telementational and determinacy fallacies at the beginnings of what can be termed the tradition of Western thought, in the works of Greek and Latin scholars. Ultimately, however,

our treatment of language as autonomous, and separable from the non-linguistic world, Harris attributes largely to literacy: the advent of writing.

2.6 Writing

The ultimate basis for the illusion that languages are codes is (i) our inclination to treat unique utterances as things that can be talked about, (ii) the fact that we then find there is no way of citing them in order to talk about them except by repeating them, (iii) the fact that we then interpret the possibility of repetition as conjuring into existence something more abstract than either utterance itself – namely, the enduring linguistic unit that both utterances are taken to be utterances of. [Love, 2004:573]

While reflexivity is inherently a feature of language, and thus speech, integrationists argue that it is the advent of writing which radically altered our perspective on our metalinguistic activities. As Linell (2005) puts it, writing makes the language-as-product view so much more possible, and so much easier to accept. With writing, we have something left over, after the action has taken place, something tangible. The illusion to which Love (2004) alludes (above) is strengthened: writing allows for a different way of identifying an utterance beyond merely spoken repetition. It constitutes “a very powerful tool for the decontextualization and recontextualization of speech, [by] detach[ing] the spoken word from the speaker and mak[ing] it ‘representable’ in another context” (Harris, 1998:123).

The relationship between speech and writing in orthodox linguistics exhibits a curious paradox. Harris highlights the irony that the conception of language peddled by orthodox linguistics – in which speech has primacy over writing – is one entrenched in, and shaped by, practices of a literate culture. In other words, the properties of writing have been generalised to hold true of speech as well, despite explicit declarations of writing’s Cinderella status. Indeed, some linguists have gone so far as to exclude writing from the domain of language altogether, demoting it rather to “a way of recording language by means of visible marks” (Bloomfield, 1935 in Harris, 1998:109), while “the spoken word alone” (Saussure, 1922 in Harris, 1998:109) constitutes the object of linguistic study.

Meanwhile, it is written language that forms the model for what proper, grammatically well-formed speech should 'look' like. That literacy has moulded the way we view speech, and by implication, the way we conceptualise language, is a fundamental flaw dogging modern orthodox linguistics. This 'scriptism' (Harris' term) forms the centre point of Linell's (2005) critique of the discipline – a discipline he, too, finds wholly tainted by what he calls the 'written language bias'.

Like integrationists, Linell regards a written language bias (WLB) responsible for mainstream linguistics' conceptions of what language is, what *a* language is, where language is situated, its structure, what language is used for, and what meaning is. He distills the WLB into 101 points (2005:ch.3); as many of Linell's points overlap with integrational linguistic conclusions already mentioned, only those which represent an extension or development of integrational thought will be focused on.

The written language bias dictates that all utterances are analysable texts; the focus of study is on the *said* rather than the act of *saying*. The idea of being able to exactly repeat someone's words seems plausible in writing (direct quotation), and thus there is a distinction between direct and indirect discourse. However, Linell notes that even in the written mode, direct quotations by implication appear in a new context, and thus are not identical to the original utterance, while in spoken interaction, there is a blurring between direct and indirect discourse.

Traditionally, the boundaries between text and context are clear, and thus texts are repeatable in a new context, unchanged – nowhere is this clearer than in the attitude that transcription is a "veridical record of speech" (Linell, 2005:118). However, because text and context are difficult to distinguish, and difficult to predict in advance of an interaction, the project of extracting 'text' from a situated communication event is inherently flawed. Likewise, dialogism regards transcription as an impoverished textual abstraction from a social, interactive activity. Toolan (1996) expresses the integrational linguistic attitude towards transcription as "a kind of absconding with that part of an interaction most easily reduced to writing, leaving the remainder as disposable residue" (p.5). It "converts an interactional event

(or series of events) into a textual product (separable from 'the' contextual setting), a property" (*ibid.*).

Furthermore, the orthodox position holds that "[c]oherence is a primary characteristic of a text, a piece of discourse or a conversation, and is defined in terms of intra-textual connectedness" (Linell, 2005:103). In contrast, for Linell, coherence is not internal to a text, but extends beyond the text as a relationship between 'discourse' and 'context'; nor is it a fixed property, but rather emergent from moment to moment 'in' the activity. Dialogism focuses on the activity rather than the product.

Grammatical ambiguity and semantic paradoxes exist chiefly in, and are products of, the written mode (a structurally similar utterance in spoken communication would feature intonation, pauses or emphasis, for example, that would avoid ambiguity). In situated communication, semantic 'problems' or ambiguities stem from sources other than structure, such as different perspectives, or vagueness (Linell, 2005).

In contrast to orthodox linguistics, integrational linguistics, holds that: speech and writing cannot be separated from each other, by foregrounding one or the other; language cannot be equated with speech; and writing is not merely a way of recording the spoken word; and thus the study of writing is not dependent on the study of speech (adapted from Harris, 1998:109). In short, writing is an alternative means of linguistic expression, not a poor reproduction of the spoken, and although it shares some characteristics with speech, it has enough unique features to be considered an object of study in its own right.

Harris (1998) highlights some key differences: writing integrates different biomechanical activities to speech, for example the fine motor co-ordination of handwriting or typing. Writing has an additional spatial dimension, whereas speech has only a temporal dimension. It functions not as a representation of different forms of speech, but rather it integrates speech with other activities (for example, reading out loud). The distinction Linell (2005) draws between the two, summarised in Table 1, largely reflects the traditional dichotomy.

Table 2.1: Differences between speech and writing

Spoken Language/Speaking	Written Language/Writing
<ul style="list-style-type: none"> dynamic behaviour distributed in real time 	<ul style="list-style-type: none"> written text and its components characterised as objects, persistent in time and static
<ul style="list-style-type: none"> involvement of bodily gestures 	<ul style="list-style-type: none"> disembodied trace of writing activity
<ul style="list-style-type: none"> interaction is wholly dependent on the situation and other contexts 	<ul style="list-style-type: none"> relatively autonomous, lacks an immediate situational context, thus must be more explicit than speaking adapted for monological use
<ul style="list-style-type: none"> communication through talk is available to all normally equipped human beings 	<ul style="list-style-type: none"> reading and writing requires explicit instruction more constrained by rules
<ul style="list-style-type: none"> primary socialisation 	<ul style="list-style-type: none"> secondary socialisation

Source: Summarised from Linell, 2005:19–24.

However, Linell qualifies this list with the caveat that the general distinctions drawn are based on the spoken prototype of informal conversation, whereas the written prototype is that of printed, expository prose. On closer inspection the distinctions between reading/writing and speaking may not be so clear cut. In certain communication activities the two media may have more in common with each other than the same media across different communication contexts. For example, some genres of spoken language are formalised and restricted in ways very similar to written language.

Secondly, Linell notes that even though there is prestige attached to literacy in our modern-day literate Western culture, both this and the belief that written language is the more ‘proper’ form of language should not be assumed to be universally held beliefs, even in literate cultures. In ancient times, it was a slave’s task to read out writing to a master – it was speech-in-person that was considered authentic and creative among the free. In medieval times, writing was distinctly distrusted – it was believed that the careless or the malicious could alter its meaning. New communication technologies blur the distinctions between

speaking and writing further, and will likely bring about a change in attitude towards the two phenomena, in time.

Paradoxically, a discipline that is shot through with a bias towards written language has no systematic, coherent theory of writing itself. “From an integrational point of view, the mistake embodied in the traditional Western view of writing is plain: it confuses *the* function of the written sign with just one of its possible uses” (Harris, 1995:7, my emphasis). That one possible use is recording speech: glottic writing, leaving mathematical and musical notation, as well as modern typography, and ‘pseudo-writing’²² out in the cold in terms of their ability to signify anything, i.e. to function semiotically (Harris, 1995). This confusion of function is the reason why writing is seen as inferior to speech.

2.7 Ideal speech and speech errors

The concept of ‘speech error’ is deeply ingrained in all manner of linguistic theories, and thus Taylor (1997) finds it necessary to devote a large section of his chapter on scriptism (ch.2) to a discussion of this orthodox illusion. Broadly defined, a speech error is anything which “disrupt[s] the ideal fluency of the speaker’s utterance” (Taylor, 1997:29); examples include silent pauses, filled pauses, repetitions, and false starts. Usually these are “represented... as the product of non-linguistic faculties at work in the speaker’s mental processing of ‘what he is going to say’” (*ibid.*).

‘Speech error’ is a revealing term; these discontinuities are not typically found in written language – they are filtered out .

In this respect discontinuity is like many of the features of spoken language, including intonation, rhythmic grouping, and articulation rate. And yet all of these, along with discontinuity, are commonly occurring features of the speech acts we regularly perform in communicational interaction. [p.30]

²² The term, as Harris explains (pp.85–87), incorporates two distinct but related phenomena, both equally fascinating. Anthropologists label shamanic writing which is intelligible only to the shaman, and only while he or she is in the trance in which the writing is produced, ‘pseudo-writing’. Psychologists have used ‘pseudo-writing’ to describe children’s preliterate scribbling which appears to have mnemonic and semiotic function, if only for them. Harris proceeds to extend the term to advertisement copy which takes advantage of the play of form and font made possible by written language.

The distinction between the reading and listening becomes readily apparent, as Taylor's transcribed example of 'normal' conversation (p.30) serves to illustrate, when one attempts to read a 'direct' transcription of speech which includes all discontinuities. It is a very disconcerting process for a reader, whereas someone listening to a tape-recording of the sample of speech from which it comes may have no difficulty understanding it.

Even among linguists, there is a lack of consensus as to the terminology describing discontinuity – which Taylor sees as indicative of the broader problem. We (as English-speaking people) do not often talk about discontinuity, and thus “English has not developed an organized terminology for talking about [it]” (p.32). However, this does not hold true for all languages – Taylor cites Brian Stross's work on Tzeltal metalinguistics, which appears to incorporate a number of expressions to explicitly talk about discontinuity.

Without the normative metalinguistic resources in our language for discussing discontinuity, Taylor points out that different disciplines in the English academic world (for example, psychology) have been free to appropriate the phenomenon for their own purposes. Apart from an identity crisis, discontinuity seems to face an ontological crisis – it doesn't really exist except in relation to its opposite (fluent speech). It has no independent features, presents no real data for inspection.

In short, the investigator of discontinuity is all the more conscious of the fact that that which matters in language is not directly observable but is, rather, the conceptual product of the way a linguistic culture talks about language, thinks about it, and uses it in culturally-defined contexts. [p.42]

Where does this accepted practice of denigrating/excluding discontinuity in speech come from? According to Taylor, historically, the discourse of rhetoric has reinforced the notion that the more speech emulates writing, the closer to perfection it gets. Ideal speech is akin to reading aloud. Reading out loud is not always a flawless affair, but what is taken to be the cause or source of discontinuities (e.g. pauses, mispronunciations) are not to be found 'in' the text (but rather 'in' the reader). By extension, this is applied to 'flaws' in speech.

What differences do exist between speech and writing are not really an essential feature of language, but things that interfere with language. This view is consistent with Chomsky's notion of 'performance error' (i.e. discontinuity of speech)²³ being caused by interference from, for example "memory limitations, distractions, shifts of attention and interest" (Chomsky 1965:3–4, in Taylor 1997:46), effectively excluding it from the realm of language proper, and thus from the linguist's object of study.

As Taylor points out, it also implies that most of the time we are speaking incorrectly (when compared to the standard of well-formed sentences produced by competence grammars). So despite the fact that so-called errors are both rife in speech, and every child seems to learn regular ways of producing these discontinuities, it cannot be considered a feature of language or linguistic knowledge/competence. Discarded by linguistics, speech discontinuity is picked up by psychology.

Psycholinguistics explains it as a discrepancy between planning and execution. Thus planning is a type of mental writing in which the perfect sentence is constructed; speech is "the reading off of a mental text" (p.52). In execution however, speech may distort the mental writing. The implicit but undemonstrated assumption on which such theories rely is that speakers are constantly trying to produce an ideal delivery. Taylor cites Clark & Clark (1977) on their justification for this assumption or belief. As he demonstrates, what it amounts to is another assumption; that the ideal delivery aids communicative efficacy, and thus fulfills "the semantic and social functions of speech" (p.51). But do deviations from ideal delivery result in communication difficulty? The onus is on those who make this claim, Taylor says, especially since deviation from ideal delivery would appear to be the norm. In a nutshell,

the proponent of the theory of the ideal delivery is asking us to believe not only that speakers constantly try to do what they almost never do but also that, if they fail to succeed, it makes no manifest difference to the success of the speech act [p.51].

²³ See quotation on page 34 above.

Put so bluntly, the standard psycholinguistic approach seems embarrassingly absurd. Assumptions such as Clark & Clark's have the effect of making grammaticality synonymous with communicational efficacy. Again, this is a formulation which, on the surface, sounds like common sense. Do people not painstakingly learn the grammar of a foreign language in order to be understood by its native speakers? Yes, but when a child says 'goed' instead of 'went', or an adult additional-language English speaker says 'The dogs *is* barking' instead of the 'The dogs *are* barking', does misunderstanding ensue? But to take an even more common example: when someone asks me where I am going, and I reply 'Shopping, to Pick 'n Pay.', do they have difficulty understanding because technically this is not a complete, grammatically well-formed sentence?

To make sense of the fact that ungrammaticality doesn't seem necessarily to result in communication breakdown, rules governing the practices of 'editing' (in which the speaker corrects themselves 'mid-sentence' ²⁴) and 'repair' (in which the hearer effectively reformulates in their mind what the speaker has said in a grammatically correct sentence) have been postulated – the psycholinguistic realisation of the doctrine of ellipsis. These are extralinguistic features which, while providing a form of organisation to conversation, and aiding transmission of the sentence, are, Taylor notes, like discontinuities, excluded from language itself.

Taylor concludes his chapter on discontinuity with the integrationist's approach to the topic:

[T]he evidence reveals (i) that discontinuities can be intentional features of a speaker's performance, (ii) that they are only disruptive from the blinkered perspective of the scriptist conception of the communicative act, and (iii) that they may serve interactional aims in speech which, due to scriptism, have too often been ignored. [p.62]

Linell (2005) echoes this approach, in highlighting the communicative function that so-called errors have in speech, as part of the online negotiation of meaning that takes place in real-

²⁴ Even the concept of speech being 'mid-sentence' is scriptist, as if the sentence was already 'there' (with demarcated beginning, middle and end) before it was spoken.

time interactions. What is significant for our purposes is that Linell emphasises that prosodic and non-vocal aspects have semiotic value, and the latter in particular can be utilised by those who have difficulty with language (in general, e.g. an aphasic, or a specific language, e.g. a foreign language speaker). Ultimately, what is called for is a more nuanced approach to so-called discontinuities, that rather than lumping all instances together as 'errors', treats their significance (or insignificance, as orthodox linguistics would have us believe) as not given in advance, but a function of the specific utterance interaction in which they occur (Taylor, 1997).

2.8 Signs

To have meaning is to have semiotic value, to signify – this is the defining property of a sign. For orthodox linguistics since Saussure, the value of a sign is determined by its relation to (via its non-identity with) every other sign within a bounded system. Thus the value within a given system is fixed. A sign itself is a "bipartite unit" consisting of "a single form (*signifiant*) and a single meaning (*signifié*)" (Harris, 1995:22); to alter either form or meaning is thus to be dealing with a new (or non-identical) sign.

Semiology – the study of signs – is a field which Saussure (1983[1916]) brought into being by his redefinition of language, and in which he situated linguistics. For him, a language (*la langue*) was a system of signs (word-forms paired with concept-meanings). If integrational linguistics rejects the orthodox Saussurean view of language, then by implication it must also reject Saussurean semiology:

In integrational semiology... the sign does not exist outside the context which gives rise to it: there is no abstract invariant²⁵ which remains 'the same' from one context to the next. Nor, *a fortiori*, is there any overarching Saussurean system to guarantee that invariance. [...] The integrational sign has no determinate theoretical structure of this kind: it is treated as a complex of which any number of different facets may

²⁵ It is worth emphasising that integrationists do not endorse the idea of invariant signifier with variable signified meanings. The notion of invariant form is just as misleading, just as much of a myth, as invariant meaning/content (see Taylor, 1997:77).

be identified, depending on the purpose of the analysis. [Harris, 1995:22, footnote added]

Rather than some pre-existing object (physical, abstract or psychological) which we manipulate in the course of using language to convey meaning, for Harris the sign only comes into being *as a sign* within an actual communicational situation. It is a sign by virtue of the fact that it is treated as a sign – its signhood is conferred by its (successful) role in integrating activities in a communicational interaction (Love, 2004; Harris, 2006). This integration “typically involves the contextualized application of biomechanical skills within a certain macrosocial framework” (Harris, 1995:22–23); successful communication is therefore a result not of static linguistic (or other semiotic) competence, as in fixed knowledge, but rather a moment-to-moment “integrational proficiency” (Harris, 2006:716). The upshot is that words (in the orthodox linguistic sense) are not signs (in the integrational linguistic sense); ‘words’ and ‘the language’ to which they belong are metalinguistic entities, “second-order cultural construct[s]” (Love, 2004), a macrosocial factor potentially influencing communication (Harris, 2006).

2.9 Semantics

Ask the average person what it means to say that words have meanings, and they will probably unhesitatingly answer, a word’s meaning is what it stands for, or what it refers to. But this introduces equally tricky concepts. *How* does a word ‘stand for’ or ‘refer to’ something else? Harris (1981) outlines some attempts at solving this. For Saussure, the answer lay in psychology, where meaning is equated with concepts; ‘items in the heads’ of speakers, for which words stood. Behaviourism in the 1930s sought to move away from explanations that hinged on unobservable mental entities, labelling such speculation unscientific. Leading the behaviourist cause, Bloomfield maintained that meaning could only be linked to items in the external world, and could only be ascertained definitively if science had investigated that item – leaving numerous words for which meaning was uncertain. Understandably, linguistics’ focus shifted from semantics to describing linguistic forms, retaining only that which could be declared utterly separate from the non-linguistic world – the grammatical, phonological and morphophonemic subsystems of language (Harris, 1981).

The Chomskyan revolution hailed the return of 'mentalism', but the segregationist stance was retained. Under generative linguistics, 'semantic knowledge' was not to be equated with knowledge of the world, for this would imply that linguistic knowledge must include everything that speakers of that language know about the world. Rather, semantic knowledge is perfect knowledge of the self-contained system of linguistic items and their meaning relations to each other. Thus the meaning of an utterance is constructed by the abstract, bounded system of the language to which it belongs; the speaker/hearer accesses this meaning by reference to/activation of their internalised linguistic knowledge, of the words (lexicon) and the rules (grammar), of that language (Harris, 1981).

But this leaves the gap between language and world wide open. A less popular theory which attempts to address this shortfall is truth-conditional semantics, where sentence meaning is determined by knowing the conditions under which the sentence would be true, i.e. correspond to what *is* in the world (Harris, 1981). The main reason for its lack of appeal is probably that it leads to redundant statements of the type "'Snow is white' is true, if, and only if, it is the case that snow is white" (Tarski, cited in Harris, 1987:159).

All of these semantic theories are based on the fixed-code doctrine that has necessitated a search for universal, context-free meanings of words, which are often labelled the 'literal' meaning of the word. Deviations from this are then labelled 'metaphorical' (more on this in Section 2.10 below). But context-free meanings are an "illusory abstraction" (Harris, 1981:68). While the segregationist sees words and their meanings as determined in advance by the language to which they belong, the integrationist sees a language as the second-order product of the way people use words to meaningfully integrate activities.

That is not to say, Harris cautions, that integrational linguistics subscribes to a view of language whereby meaning is to be found in the intentions of the speaker. Firstly, this quickly dissolves into 'Humpty Dumpty'²⁶ linguistics, whereby words can mean absolutely anything the speaker decides at a given moment. Secondly, it relegates the hearer to a passive or non-existent role in meaning making. Thirdly, it is not exactly clear how one would express someone's intention 'behind' what they said, except by repeating what it was they

²⁶ Harris is referring to the *Through the Looking-Glass* character (Carroll, 1960).

said. Lastly, taken to its logical conclusion, this view may even endorse the belief that one's intentions are constrained by the language in which one expresses oneself (Harris, 1981).

Toolan (1996) doesn't reject intentionality outright, instead – paraphrasing Knapp & Michaels' (1987) position – he highlights its role in communication, and in writing specifically:

To treat marks as intended, as language, is thereby to assume an intending author, regardless of their evident absence. And the basis for deciding whether marks are authored, intended and language or accidental, unintended and meaningless... is empirical rather than theoretical... guided by past empirical experience and the larger present context [p.122]

But for integrationists, “meaning is always ‘now’” (p.125), and therefore Toolan's conclusion doesn't contradict Harris's: authorial intention is mediated by the role of the addressee (which Knapp & Michaels overlook) in the present context. Furthermore, “[s]ubsequent historically situated interpretations of text are not an overlaying of new contingencies on an established meaning but a thoroughgoing reformulation (not a revision in the sense of a correction) of what the original meaning is” (*ibid.*).

The theory of intentionality can be understood as derived from the everyday practice of using the word ‘mean’ to convey intention, i.e. ‘What did you *mean* by that statement?’. We are not asking ‘What was the hidden string of mentalese situated in your head which you felt that statement was an accurate expression of?’ We are signaling a failed communication attempt and asking the speaker to try again. However, (as Taylor and Harris have argued, see Section 2.5 above) a metalinguistic analysis of the initial ‘What do you mean?’ statement has led to the second-order notion of meanings hiding in the speaker's head in a different format, waiting to be expressed. Similarly, glossing practices are not seen by integrationists as evidence of a fixed code, but rather evidence of the resources speakers have for reducing the semantic indeterminacy inherent in language. Thus asking ‘What does *filigree* mean?’ and getting an answer that satisfies both questioner and respondent is proof weighing *against* the

fixed code theorist's argument, and not the 'Exhibit A' of invariable meaning it is usually taken to be.

2.10 Metaphor

One of Harris' (1981) conclusions about orthodox linguistics is that adherence to the fixed code makes it difficult to give any plausible account of metaphorical language. Metaphorical language is supposed to be the use of words in a way that deviates from the fixed code that contains their literal meaning. How we can make sense of this language then can only be explained by reference to something outside of language, our extra-linguistic knowledge of how to use language in everyday situations. That our language is littered with so-called 'dead metaphors' makes the task of distinguishing between the literal and metaphorical, and thus the code and the use to which it is put, virtually impossible.

Michael Toolan bravely tackles the minefield of metaphor in *Total Speech* (1996). He opens his interconnected chapters on literal and figurative language with Stanley Fish's provocative claim that "there is no such thing as literal meaning" (Fish, 1989, in Toolan, 1996:24), a statement that soon wanes in absurdity as one follows the argument through the two chapters. He asserts that the stark literal/metaphoric dichotomy is really "a deeply embedded convenience of literate Western culture" (*ibid.*). Its 'convenience' points to its utility, and ultimately to its significance: the concept of literal meaning (and thus its contrastingly defined other, metaphor) is "an important myth" (p.50).

Significance in everyday interaction aside, we should not lose sight of the fact that "conceptualizations in terms of literalness versus metaphoricality are themselves essentially a form of figuration" (p.25) – thus the concept of literal meaning is thoroughly metaphoric; there is indeed 'no such *thing*'. Literal meaning is figured as the highly suspect context-free, ground zero from which all meaning making starts. Despite the fact that "in practice no such domain of context-free meaning exists" (*ibid.*), most semantic accounts appear, implicitly or explicitly, to regard literal meaning as foundational.

Crucially, Toolan points out that there can be no such thing as invariable identity across contexts, only similarity. We 'remember the gap' as he puts it (p.33). No matter how routine

an interaction or activity may seem, it is not identical with the last time we did it. We are different in time, for one. To forget 'the gap' would render our experience of the world pathological, without orientation in time and space.²⁷

The received, orthodox view of metaphorical language holds that metaphorical language is "different in kind" from conventional language, and that is made possible by the user's "perception of [in contrasting accounts] either anomaly or analogy" (p.59). This provides the foundation for the three dominant theories of how metaphor works: substitution, comparison, and interaction.

Componentialist semantics, whereby the meaning of a whole is the sum of its parts, holds that in order to derive the meaning of a metaphor, one must cancel out those literal (fixed) meanings of the 'vehicle' that don't apply to the tenor. Toolan finds that even pragmaticist accounts seem to rely on some notion of literal meaning – a sort of 'literal meaning plus context' approach.

Toolan states the integrational position as follows:

literal meaning is not an irrelevant category; it plays a role in utterance construal, but has no foundational role and is not logically and interpretively prior to other supposedly derived meanings... but influences interpretation in that it often encapsulates a familiar and well-established usage [p.44]

Toolan calls for a focus on *use* and *habituation*, rather than pre-given literal meanings, and for a relativisation of the literal/metaphorical distinction. In stark contrast to the orthodox account, the integrationist take on metaphor is as "neither process nor thing but the name of a practice" (p.56), and rather than a deviation from normal language use, Toolan characterises it as an expression of the norm of *novelty* in language.

He draws a parallel between notions of conventional and non-conventional usage, and those of standard and non-standard dialects. There is a tendency to regard non-standard dialects as

²⁷ Indeed, even a recurring sense of *déjà vu* requires a notion of chronology, of past and present as separate.

parasitic upon, even altered or warped versions of, the standard (even though such an opinion is now largely banished from linguistics); however, its users do not have to refer to the standard dialect to 'interpret' the meanings of non-standard words in the dialect – they simply use the dialect. That it can be paraphrased into standard dialect is not to say that *that's* what it *really* means – paraphrasing is merely a useful practice for an outsider. That one dialect is regarded as standard, and another as non-standard, is a matter of authority and politics – it does not embody any empirical fact. So too is the relationship between conventional and non-conventional usage. "Whenever we are the recipients of a creative metaphor, we are in the position of familiars of conventional language faced with unconventionalism" (p.67).

Metaphor (or novel/creative metaphor, rather), then, is a risk-taking manoeuvre, with the potential reward of enhanced insight or intimacy. And it plays a creative role in the renewal and change of language. For this second property of metaphor, Toolan draws support from psycholinguistic research that proposes an unconventional way of looking at metaphor: to regard the metaphoric term as setting up (temporarily) a superordinate category to which both vehicle and tenor belong, and of which metaphoric term is then a prototypical exemplar. Thus the influence between vehicle and tenor is bidirectional, rather than the orthodox notion of influence flowing from vehicle to the tenor only (1996:70–71). In other words, there is nothing necessarily *inherently* similar in vehicle or tenor, but metaphorising makes it so.

Toolan thus challenges the notion that metaphorical meaning is parasitic upon literal meaning. In fact, some have even argued that the literal may be derived from the metaphorical – viewing it as a narrowing or "pruning" (Kittay, 1987 in Toolan, 1996:69) of the broader/more abundant associative meaning held by metaphor. In any case, psycholinguistic research supports this challenge to literal meaning's priority; when subjects' processing times for literal or conventional metaphoric terms in context are compared, there is little difference (i.e. there is no time for stepwise computation in metaphor). In fact, as Toolan notes, idioms have long been regarded as 'long words' in terms of the brain's processing. However, this is not true of all cases. The 'ease' or speed of interpretation relies on factors other than purely the literal or non-literal nature of the utterance: the location of

the metaphor (whether it flows across sentences, or vehicle and tenor are explicitly referred to in one sentence) and power relations between speaker and hearer have been found to influence processing time. As Toolan explains, in all these instances, a certain kind of performance is being tested (“‘Is this sentence a reasonable paraphrase of that one?’” [p.79]) – to infer competence from this is somewhat reckless. For the integrationist, there is value in such investigations into performance, as long as they are treated as such. (A similar concern can be raised about inferences drawn from tests of schizophrenic patients’ comprehension of metaphorical language, as shall be addressed in Chapter 5, below.)

In conclusion, then, “[m]etaphorizing is using language, only more so” (Toolan, 1996:92). We should be careful of assuming that because a metaphor can be paraphrased into more straightforward terms, it is a different *kind* of language. The integrationist acknowledges that it can have special uses, but this is not to say that it ‘works’ any differently from conventional language. “Paraphrasing is an important language game, but it is not a procedure occupying an autonomous position outside all language games, as if it underwrote or monitored them. The paraphrase of a metaphor is not equivalent to that metaphor” (p.95). Thus, the integrational approach to metaphor seriously calls into question the validity of using figurative language as a measure of some dedicated cognitive faculty or ability.

This approach is supported by subsequent work in cognitive science. Lakoff & Johnson (1999), who since the 1980s have consistently highlighted the fundamental role metaphor plays in the way we experience the world, and think and talk about it (e.g., Lakoff & Johnson, 1980; Lakoff, 1987), also question the ‘special’ status bestowed on metaphorical language. They deny the existence of metaphorical language as such, and champion the existence of metaphorical thought which, far from being an exceptional case, is our default way of thinking. They also deny the strict distinction between perception and conception, arguing for a blending of the two; thus language and thought cannot express objective truths about the world (truth being one distinguishing feature between literal and metaphorical, the former expressing something ‘as it actually is in the world’, the latter not), because all our thinking, and therefore concept formation, is intimately bound up in our sensory perceptive abilities as human beings. The reasoning behind this derives from a belief about the

embodied nature of language and thought, and will be discussed further in Section 2.12 below.

2.11 Language emergence

While integrational linguistics spends a great deal of time talking about where our *concept* of language comes from, it doesn't have too much to say about language (however one characterises the phenomenon) evolution in the species.²⁸ As mentioned in Chapter 1, speculations about language evolution are of particular importance to theories of schizophrenic language, because there is evidence to suggest a genetic relationship between the emergence of psychosis and language in *Homo sapiens* (e.g. Crow, 1997; De Lisi, 2001; Burns, 2007). There are a number of competing mainstream accounts of language evolution, so it is difficult to determine *the* orthodox position. Nevertheless, there is an overall trend to treat language as a distinctly human entity, i.e. there is something about human language that no animal communication system shares.²⁹ According to Hauser, Chomsky & Fitch (2002), this is the oldest of "[a]t least three issues [that] cross-cut the debate on language evolution" (p.1570); the other two are whether language evolution was gradual or represented an abrupt change, and lastly what Hauser *et al.* call the "continuation versus exaptation issue" (*ibid.*), that is, is language as we know it the result of an ever-improving system of communication, or did it evolve from human abilities/structures/faculties that were initially adapted for something else? A belief that human language is unique, in the context of evolutionary theory, is the basis for the postulation of a biological endowment – located in the brain – that sets humans apart from their primate ancestors and modern-day relatives. Clearly a belief about what language is, then, is crucial to this project.³⁰ Apart from a measure of

²⁸ Talbot Taylor has, however, co-authored a book on the ape language debate with Sue Savage-Rumbaugh and Stuart Shanker (*Apes, Language and the Mind*, 1998).

²⁹ Traditionally, language as a unique and sophisticated system, and thus the humans who use it, have been regarded as the pinnacle of evolution (Linell [2005] calls it the secular version of language as God-given to man), i.e. the ultimate communication system. For theorists like Steven Pinker (1994), however, language is just an instinct – for humans – like flying is for birds, or swimming for whales. Thus, according to Pinker there is no sense in comparing our communication abilities with those of modern-day chimps (our closest relative, evolutionarily speaking) or any other animals – any similarities could be explained just as easily by analogous evolution (related in the way bees' wings are related to birds' wings) as by invoking some homologous feature shared with a common ancestor.

³⁰ As Savage-Rumbaugh *et al.* (1998) argue in their closing chapter, much of the debate concerning whether apes really acquire *language* centres around representation, not interpretation of the data, because of the potential to "undermine the assumptions that undergird much of modern linguistics, psychology, and philosophy" (p.181).

uniqueness attached to human language, the other assumption shared by competing theories is that the benefits of language must have far outweighed any negative attributes of the biological changes that made language possible.

Toolan (1996) does touch on the subject, although his brief ruminations are a preface to a discussion of development of language in children. The development of a healthy child gives an opportunity to observe language emerging in an individual – but they are born into a ‘linguaging’ world; how did language emerge in a language-less people? Linguists and philosophers have speculated about this for centuries, and although there is no way of knowing for sure, I would argue that Toolan’s integrational take on the problem is supported by work in evolutionary psychiatry that rivals Crow’s (1997) theories (see Section 5.1 on Burns, 2007).

Toolan paints a picture of a pre-linguistic society in which a group of men’s regular activity is tree felling. He imagines the group consisting of men of different status, if only by virtue of their age. Over time, certain sounds (grunts) – especially those uttered by the head (oldest) tree feller – may come to be associated with certain manoeuvres, much like other physical responses to the activity of chopping, or lifting (for example, bracing certain muscles). The link is no more than saying the sound ‘goes with’ the activity, but importantly what counts as the beginning and end of the sound will follow the segmentation of the activity itself (how it is thought to consist of different steps or stages by the participants – crucially, there is no ‘natural’ division).

To be sure, the sounds do not enable or even aid the tree-felling activity, and do not have significance outside of the immediate activity either, and may have initially been established in a ritualistic capacity. But that they have been ‘noticed’, identified as some *thing*, is the crucial first step towards developing language. The act of picking them out as a separate entity allows for them to be consciously/voluntarily wielded or manipulated. With the passing of time though, eventually these grunt sounds may have come to be treated as instructions from the head tree feller. However,

there are no guarantees... that the same sounds will be associated with the same meanings by every participant. The language will have arisen out of no such blueprint of certainties. It will have started with a spirit... of trust or belief that another's pattern of grunts... are reflective of the different purposes they do so accompany, in some patterned way [p.100]

Toolan's illustration serves to show, firstly, how the principle of cotemporality is logically prior to any displacement property which language may have. Secondly, "language as a mode of action" precedes (both ontogenetically and phylogenetically) "language as a means for thinking" (p.110).

While he acknowledges that there are difficulties with aligning phylogenetic with ontological language development, there are parallels. The apparently 'effortless' way in which human children tend to develop language has led many to conclude that a good deal of language ability is innate, considering the 'poverty of stimulus'. But a five-year-old's language ability can only be considered equivalent to an adult's if one mobilises a distinction between competence and performance (as orthodox linguistics does). Thus, what a child acquires 'effortlessly' is the ability to use form-meaning pairs (language) as an adult does, although their proficiency in *a* language (their native tongue) is still inferior. Integrationists argue that this overlooks a large proportion of the input and learning that the child is subject to. As Linell (2005) observes, children grow up in an (linguistic and extra-linguistic) information-rich environment. Coming into language is about more than merely being exposed to a sufficient set of sentences made possible by the structure of a given language. Whereas an adult may learn to speak a language, for example, English, a child learns to become "an English-speaking *person*" (Toolan, 1996:281, my emphasis). Words can only be learnt in context (even the dictionary is a context), and learning words is generally impossible to isolate from learning activities (Linell, 2005).

What is needed for language to develop similarly in most human children is not a shared genetically hardwired capacity for language, as in a built-in 'knowledge of grammar' structure forming the scaffold for the actual language to which the child is exposed, but rather, Toolan argues, similar patterns in our language practices derive from our natural endowment that

makes us “rational, reflective, imaginative, sense-making, pattern-seeking, other-oriented individuals” (p.302) – what Linell (2005) calls “a biologically endowed capacity for dialogue” (p.110) that goes well beyond the verbal. Thus Toolan shifts the onus from language-specific (cognitive) to general human (social) capacities.

By extension then, rather than “rule-governed activity”, integrationists view language as “hypothesis-backed creativity” (p.317), where our past experience is a useful guide, but not completely constraining. “Too often... human tendencies to develop and observe patternings and to be trained in and conform to normative formats are recast in the linguistics literature as intrinsically cognitive rather than social” (p.316) – resulting in the mythical mutual knowledge which is said to lead to mutual understanding.

My only objection here is that Toolan is mobilising a more traditional conception of ‘cognition’. There is no need (nor perhaps is it possible) to draw a stark distinction between the social and the cognitive individual. Indeed, Stephen J. Cowley a psychologist³¹ with strong integrationist leanings, maintains similar conclusions to Toolan, namely that “[t]he child needs, not an adaptation for language, but ways of assessing and managing others that sustain encultured and word-based judgements” (2006:217), and yet without clinging to an individual-based notion of cognition. Cognition is a social, jointly-achieved activity. While Harris casts thinking, in the integrational perspective, as self-communication, there is no reason for the definition of cognition to stop with ‘self’. Linell (2005) regards the view of cognition as being located solely *in* an individual as yet another consequence of the written language bias. Rather, dialogism proposes that communication be viewed as “the environment for individual as well as collective (‘distributed’[...]) cognition” (p.97). Thus any strict separation of cognition and communication is artificial. The notion of a complete, formulated thought awaiting transportation to an interlocutor’s mind is patently false – on this Linell (2005:99) quotes Merleau-Ponty (1962): “[s]peech does not translate ready-made thought, but accomplishes it”. The communication of thoughts and feelings, for example, is

³¹ Cowley has also studied linguistics, and is the co-ordinator of the Distributed Language Group (Distributed Language Group, n.d.), which focuses on the embedded and dispersed nature of language, in line with integrational linguistics.

also often unavoidably intertwined. Utterances are to be regarded as “meaningful actions, rather than plain ‘behaviour’” (p.102).

Dialogism also opposes the ‘brain as computer’ model of cognition. Learning, thinking and remembering – quintessentially ‘individual’ occupations – are dynamic activities, involving construction and reconstruction, appropriation and participation. Fixed item (verbatim) recall only occurs in particular contexts. The mind, seen as the seat of cognition, “is an abstract and comprehensive way of talking about the abilities of the (‘mindful’) person to interact with the world” (p.112). Even at the neurophysiological level of the brain, connectionism and theories of neural networks provide an alternative to the picture of the brain as manipulating representations. For Linell (2007), the brain is thoroughly dialogical, a view that accords strongly with Cowley’s (2004, 2006), as we shall see below. There is no reason why integrational linguistics should not embrace this view of cognition. Indeed, there are indications that some integrationists already do.

2.12 Language: embodied, embedded, encultured

Even if not explicitly stated, integrationists are typically sympathetic to interdisciplinary studies of human behaviour. Recent investigations into correspondences between integrational linguistics and an approach in cognitive science known as ‘distributed cognition’ are thus hardly surprising. Love (2004) is of the opinion that there are definitely grounds for a fruitful collaboration between the two fields.³² However, he criticises what he sees as the unnecessary attachment that Andy Clark (as one of the leaders in the field of distributed cognition) has to the ‘classical view’ of mind (passive, disembodied, symbol manipulator), evidenced in his fixed-code view of language. More than just unnecessary, Love maintains that it is detrimental to Clark’s main argument: the embodied mind and the fixed-code view of language are two theses which cannot logically be held concurrently.

Broadly sketched, those who uphold the notion of distributed cognition adhere to a belief that the mind/brain cannot be studied out of context – the context of the human body. It is

³² In his appraisal of the conversation between distributed cognition and integrational linguistics, Harris (2004) finds the concept of ‘distributed mind’ illogical, a category mistake, and proposes that ‘distribution’ be replaced by ‘integration’.

not an abstract machine, but a situated pattern-completing device, that has evolved out of the needs and practices of human beings. And human beings themselves are situated in a world 'out there', the bigger context that also has to be taken into account. Distributed cognition paints the picture of a mind that uses the world out there to its advantage – as scaffolding to enhance its abilities. The mind is 'distributed' because thinking is not restricted to the brain, but rather, the cognitive load is shared with the embodied brain's surroundings (Clark, 1997a).

The human mind/brain's design equipping it to exploit its environment often leads to the invention of artifacts to further this aim (for example, a calculator aiding mental arithmetic, or a souvenir aiding memory). In this regard, Clark labels language as the "ultimate artifact" (1997b:193): it provides individual brains with "culturally achieved representation" in place of "time- and labour-intensive internal computation" (p.200). Secondly, it enhances the brain's cognitive abilities by allowing for second-order cognition; language provides a medium for thoughts to be inspected and potentially edited. Both of these features, for Clark, depend on language being a fixed code, however, internal second-order cognition is only possible because language in its original public form, as an external symbolic system, evolved to achieve this invariant relationship between form and meaning (for maximum communicational efficiency).

This view of language as artifact designates language as tool and container – a meaning-holding device. Humans place their meaning inside the language to be passed onto someone else (separate in space or time) or themselves, where the meaning can be taken out (a reemployment of what Harris would call the 'conduit' metaphor). Love locates the origin of the problem in Clark's implicit, but erroneous theory of semiology, where signhood is conceived as a property of an object (even if it is an abstract object like a word – linguistic signs operate like highly specialised versions of the signs³³ we encounter in everyday life), as opposed to the integrational linguistic approach in which signhood is transient, a feature of the circumstances in which it arises. Secondly, Love notes that Clark does not distinguish

³³ By this I mean the physical object we call a sign (for example, a sign pointing to the bathrooms) which, according to Clark, enable "a little individual learning to go a very long way" (p.201) – saving time and effort.

between speech and writing, and indeed “many of [his] examples of the use of public language involve written language” (2004:540). He adheres without real proof to the untenable (as Love illustrates) belief that “‘linguiform’ thoughts are distinct and separable from their linguistic ‘encoding’” (p.542). Ultimately, Clark has fallen prey to the language myth’s scriptism.

Distinguishing whether we are performing second-order cognitive operations on our thoughts reified as mentally rehearsed in inner speech or in written-down form doesn’t seem that important, until one questions, as Love does, whether these “are... operations on our thoughts or on our language” (p.542). ‘Our thoughts, of course!’ seems the obvious answer, until he challenges us to explain the actual difference between editing one’s own writing, and editing that of another person. We surely can’t be editing their thoughts while they aren’t even in the room? This conundrum disappears when one takes the integrational stance of a written text only being meaningful within its embedding in a larger communicational interaction. It is the product of our collective, distributed cognition which is a dynamic activity – ‘thoughts’, then, have as much (second-order) reality for the integrationist as language; ‘meaning’ is only to be found in the thinking.

As Love (2004:542) puts it,

it is not because a language is a code that we are enable to reify our thoughts. Rather, it is because (with the crucial aid of writing) we reify our utterances – treat them as instances of more abstract entities – that we (think we) develop a code. And because we (think we) have developed a code, we become inclined to identify as our ‘thoughts’ the allegedly fixed semantic content that our utterances, actual or potential, allegedly encode, and then to think of our minds as, among other things, repositories of those thoughts.

The second-order construct of language, brought about through our metalinguistic activities, could perhaps be considered an artifact, but for different reasons; it has profound political and normative utility. Conferring signhood, our integrational proficiency, is a fundamental feature of our distributed mind. It is my opinion that an integrationist perspective would

revise Clark's theory so that language is understood as a product of our ability to use other embodied human minds (and our own mind separated from us in time) as the 'ultimate artifact' for enhancing our own abilities. Surely this is nonsensical – another's mind cannot be an artifact, for it is not created by someone other than its owner? On the contrary, becoming 'mindful'³⁴ is a mutually constituted process – mediated in part perhaps by language, but logically prior. We treat infants as being mindful, their behaviour as meaningful actions, long before they acquire language, and this is how they do indeed become mindful – “caregivers... treat children as intentional agents” (Cowley, 2004:293), and thus “[m]uch development... is driven by what adults think or want children to feel and mean” (p.294). Or, conversely, it is “the infant [who] exploits two brains” (Cowley, 2006:200).

While Clark treats language as the premium cultural artifact, tools to alter our cognition, Cowley sees words-as-cognitive-tools in human development as secondary to the seamless enculturation, the embedding in culture, that takes place with a healthy infant. He maintains that “infants do not ‘learn languages’. Rather, they take part in social life organized by soundings, wordings and a historically derived nexus of beliefs, desires, intentions and ways of acting” (2004:295). Treating words as words, or minds as minds, is a cultural belief based on culturally appropriate behaviour, which “[w]hile useful in social life...are inappropriate entities on which to base explanatory theory” (p.296).

Returning to language itself, Clark (1997) cites tentative work in cognitive science that suggested that rather than humans having brains “especially adapted to acquire natural language” (p.212), the reverse is true: natural language has evolved to exploit existing features and capacities of human brains (this is not to adhere to the long-since discredited notion of language-as-organism that holds that *specific* languages ‘adapt or die’), or rather, there is a symbiotic relationship between language and user, a bidirectional shaping. Lakoff & Johnson’s (1999) hefty account explores this in full, applying these insights from cognitive science (i.e. cognition is embodied) to the philosophy of language and mind. As mentioned in Section 2.10 above, their theory hinges on a fresh conception of ‘metaphor’ – for them ,too, the traditional understanding of what figurative language is, is fundamentally flawed.

³⁴ In Linell’s sense of the word (see Section 2.11 above).

In a nutshell, what Lakoff & Johnson argue is that our physical bodies are intimately involved in concept formation because we use the same neural structures for conceptual work (cognition) as for sensorimotor work (perception) – “the very properties of concepts are created as a result of the way the brain and body are structured and the way they function in interpersonal relations and in the physical world” (p.37). Thus in one devastatingly brilliant manoeuvre, Lakoff & Johnson attempt to close up the gap between mind and body *and* between language and world. This insight leads to the conclusion that abstract thinking is inherently metaphorical, for reasons that are at the heart of the integrational approach to language: initially, subjective experience (later described in terms of abstract concepts, invoking metaphorical language), is conflated with the sensorimotor experience it usually co-occurs with. Later the two domains are distinguished, but the association remains. Lakoff & Johnson use the example of ‘Love is Warmth’: babies are held close by carers, who express their love by cuddles, hugs etc. Thus the concept of being loved is conflated with warmth (and closeness) – that emotion of love is always accompanied by the physical sensation of warmth; they are one entity. Later, as experience broadens, they are distinguished. But the associations which remain are realised at the neural level.

Like Toolan, Lakoff & Johnson, albeit on a different ‘level’, provide a model of embodied language that is efficient; it ‘uses what we’ve got’ rather than positing some extra brain module or faculty that explains the nature of language. Lakoff & Johnson do not subscribe to a view of language that is wholly in agreement with integrationism, and their differences and correspondences provide enough material to warrant an in-depth discussion, for which there is no space here. While they oppose the computational model of brain-as-symbol manipulator, and explicitly reject Chomsky’s model of language for its implications concerning personhood, they do still hold to some traditional aspects of language that Harris, at least, would reject out of hand. Nevertheless, their insight that abstract thought is bound up in perception and the physical world (they inherently fit together) is invaluable in the context of studies of psychotic language that have made much of the link between abstract, metaphorical thinking and rationality.

Together, the theories of distributed cognition and embodied linguistic philosophy force traditional concepts of language and mind to account for their exclusion of fundamental

properties of the entities which they purport to be studying: that language and mind are embodied in beings that are encultured in a social context, and embedded in a physical world. These features are constitutive, and not coincidental; the Cartesian view of mind, and the segregationist view of language, are found wanting.

2.13 Conclusion: language and rationality

As should be clear from this overview, ideas about language are inherently bound up in ideas about the mind. If integrational linguistics stands in opposition to traditional orthodox linguistics, then by implication, it will oppose the traditional orthodox accounts of the language behaviour of the mentally ill, which invoke a segregationist account of what language is and how it operates. While no integrational linguistic account of schizophrenic language has been formulated, integrational linguists do call into question traditional accounts of rationality, as a human, language-based faculty.

Harris (1981) points out that, traditionally, although the faculty of language is considered to be what makes us unique as humans (and is a key marker of our rational capability distinct from all other species), ability to use language is not an indicator of rationality – even madmen use language, and can do so to communicate with the sane.

A typical response to the speech of those presumed to be irrational is, as Trevor Pateman has pointed out, to 'invalidate' it as communication by withholding the reaction it might otherwise be expected to evoke. Thus a doctor in a mental hospital may simply ignore the patient's question 'When am I going to released?'; or treat the patient's statement 'My letters are being opened' not as a genuine complaint to be investigated, but as a symptom of fears and anxieties. In this way madness is, to use Foucault's phrase, 'reduced to silence by positivism'. It is as if nothing had been said: or almost. But not quite. For even in these cases, the 'invalidation' procedure is a way of making sense of what is said. For the doctor to treat the patient's statement that his letters are being opened as symptomatic of the patient's anxieties is to presuppose that the patient is using the words 'My letters are being opened' to give an accurate report of unfounded fear. [Harris, 1981:194–195]

Clearly, it is *what* someone says that is a key means of determining their rationality – madmen convey their irrational ideas *through* language. Thus defining rationality as the ability to use language is tautological, and doesn't get us any closer to a distinction between the sane and the insane. Harris runs us through the options: if, as is often the case, rationality is defined as the ability to 'reason cogently' (expressed in language), and cogently is taken to mean 'convincingly', then we could still be mistaken about someone's status as rational or irrational. But if 'cogently' is taken to mean "correctly, validly, in accordance with the rules" (p.197) (and 'rules' here are broadly accepted to be those of logic), this is *still* not a particularly helpful answer. How exactly does one determine whether someone has followed the rules of logic correctly, when often their thinking or reasoning procedures are not made explicit in what people say?

For the most part, the "rational speaker is envisaged as a competent speaker-hearer additionally equipped with whatever pragmatic knowledge will enable him to put his linguistic competence to effective use in actual communication situations" (p.198). Thus, the irrational speaker lacks the latter knowledge while retaining the former. However, through the lens of the language myth, what this linguistic knowledge amounts to is a "system of rules generating sentences of a language" (*ibid.*). Traditional linguistics draws a distinction between these abstract sentences and the actual utterances produced by actual speakers in the context of actual discourse: "[a]lthough not part of discourse, they [sentences] impart to discourse its recognisably linguistic character" (*ibid.*). As mentioned earlier, this discrepancy is explained away by the twin doctrines of ellipsis and the separation of linguistic and practical knowledge. Twin doctrines which ultimately undermine themselves in their implications of an infinite elliptical regress.

Their implication for the concept of rationality is no different, as Harris proceeds to point out. For to know that someone has followed the rules of logic correctly (without any room for ambiguity) means to know exactly which utterances stand for which sentences in the language (to make their logical steps explicit). But to know this (which utterances stand for which sentences) effectively requires that one know what each utterance means; a chicken-and-egg scenario has been set up in which no starting point can be located. According to this

model, we can never ascertain whether someone is rational or not; it is in effect a meaningless concept within the constraints of traditional orthodox linguistics.

As we shall see, Harris' version of the orthodox relationship between language and rationality is somewhat incomplete. For it is not only the content, but also the form of mentally ill patients' utterances that are scrutinized by medical professionals to determine the nature and degree of their grasp on reality. The motivation is similar: not only the content, but also the form of thought is reflected in their language; deviant speech indicates deviant thinking. In fact, when it comes to schizophrenia, the significance of the content of patients' speech has been downplayed in favour of the form, in terms of whether it follows that language's specific rules of phonology, morphology, syntax, for example. The lack of adherence to these rules is postulated as the reason that interlocutors have difficulty understanding schizophrenics' speech, despite speaking the 'same' language. The 'level' of language most commonly implicated, however, is the level of pragmatics.

As mentioned in Section 2.3, integrational linguistics glosses 'rationality' as the layperson's "everyday assumptions concerning the total behaviour of a reasonable person" (p.165). Someone is irrational when there is a lack of fit – or integration – between their linguistic and other behaviour, and between their linguistic behaviour and their particular situation in space and time. This definition surely provokes the immediate question 'how does one determine a "lack of fit"?', but by now, the answer should be clear. The criteria for 'lack of fit' are not given in advance, but are worked out by participants from situation to situation (but taking into account their previous experience). Determining irrationality is a metacommunicational activity, and not one that involves identifying an inherent property of mind or behaviour.

Furthermore, for the integrationist,

[a] person who can no longer integrate today's experiences with yesterday's, or plan for tomorrow, is a person for whom even self-communication has broken down; and any such *dis*-integration of the self destroys the only basis on which language is possible. [Harris 1998:29]

The importance of this formulation of the relationship between language and rationality cannot be emphasised enough. The loss of rationality is the loss of the ability to communicate (to integrate activities);³⁵ the loss of communication leads to the breakdown of language. In the conventional view, communication failure is the result of language disorder, which itself is a marker of confused thinking. In contrast, from an integrational perspective, evidence for irrationality, or madness, will be found in communication deficit (i.e. activity-integration deficit), not 'inside' the language (whether that be in the individual word choice or the semantic, grammatical or pragmatic structure), or even 'projected' as part of the brain. Virtually every aspect of linguistic behaviour catalogued in this overview has significance for research into schizophrenic language. What the following chapters serve to illustrate is that, outside of the constraints of the language myth, many of these 'features' no longer make sense. Far from being neutral descriptions of symptoms, they are – as any metalinguistic analysis only can be – mediated interpretations, since a 'science' of language is impossible.

³⁵ In this light, it is noteworthy that in 2002 when the Japanese Society of Psychiatry and Neurology decided to replace their existing term for schizophrenia, *Seishin Bunretsu Byo* ("mind-split-disease"), in a bid to avoid the stigma and ambiguity associated with the old label, they settled on *Togo Shitchō Shō*, or literally "integration disorder" (Sato, 2006:53).

3. THE LANGUAGE MYTH BIAS IN STUDIES OF SCHIZOPHRENIC LANGUAGE

3.1 Introduction

The language behaviour of schizophrenics is an enduring puzzle. Despite more than a century of research into the phenomenon, findings have often been inconclusive, contradictory (Andreason, 1982). The puzzling nature of schizophrenic language has engendered a variety of approaches and theories, which have enjoyed popularity perhaps for decades, only to recede into obscurity, and be revived yet again in a new form. The central confusion seems to arise out of the ill-defined nature of the terminology and concepts employed in exploring the phenomenon. A recent example of this is Marvel (2006:14): within the space of just two paragraphs, she employs a multitude of terms almost interchangeably – “language deficits”, “FTD” [formal thought disorder], “disorganized speech”, “thought-disordered speech”, “linguistic impairments” – to refer to the phenomenon under discussion. Indeed, almost every paper, article, chapter, or book written about schizophrenia and language finds it necessary to include the caveat that the concepts under discussion are somewhat fuzzy and/or subject to debate. Often this extends to an assertion that in the past these have been somewhat ill-defined that simultaneously calls into question the validity of selected previous studies, and serves to explain the apparent direct contradictions that exist in the literature. This is usually followed with the reassurance that the present study aims to alleviate these problems by defining more definitively the terms under discussion.

While this critical approach may be admired, it does prompt the question as to why clinicians and researchers don't seem more bothered by this, what one researcher has termed a 'persistent plague' (Andreason, 1979), and why attempts to overcome it seem destined to fail. My argument in this chapter is that it is largely due to a limpet-like attachment to an erroneous underlying conception of language and thought in general (broadly speaking, Harris's 'language myth', as explored in the previous chapter), which each subsequent revision or refinement still uses as its founding premise. Better defining the terminology or concepts amounts to reshuffling a deck of cards in the hopes that the missing card will reappear. The second point to my argument is that it is the involvement of linguistics as a

discipline, both individuals from the field, or theories borrowed from it, that has played a significant part in this viewpoint's rise to dominance (although it is certainly not solely responsible).

My first task is to demonstrate that this language myth is present and influential in modern mainstream conceptions of schizophrenic language. My second, dealt with in Chapter 4, is to ask whether this has always been the case; by reviewing the history of research on the phenomenon, I shall demonstrate a narrowing and abstraction of what is considered to count as linguistic, particularly after the explicit introduction of linguistic theory in the late 1960s. However, considering the ancient roots of the language myth, and its pervasiveness as common sense, one can expect aspects of it to inform even the earliest accounts of the disease. Thirdly, on a more abstract level, in Chapter 5 I will tease out the main themes that have preoccupied researchers of schizophrenic language, as well as the topics that are conspicuous in their absence or low profile, particularly in recent accounts of SLB, demonstrating how both are direct consequences of a segregationist stance on language, somewhat, I believe, to the detriment of progress in making sense of schizophrenic communication disturbance.

3.2 The current mainstream view

If these conceptual and terminological ambiguities abound, how can one hope to elicit or define *the* mainstream view on schizophrenic language? To be sure, to broadly sketch the mainstream view is to create a picture of a homogenous, unified approach, which does not exist as such – a consequence that is not wholly avoidable perhaps. The easiest place to find a concise overview of the mainstream approach to schizophrenic language is in sources by authors who disagree with this view, who position themselves as 'outside' the orthodox school. Naturally using these alone runs the risk of being accused, like Harris (see Joseph, 2003), of setting up a straw-man argument by caricaturing that which one is criticising.

The primary point of agreement between all approaches is that some people diagnosed as schizophrenic speak *strangely* some of the time. While schizophrenic speech is easily recognisable, what it is that makes it so 'strange' has itself been hard to pin down (Lorenz, 1968). This 'ununderstandability'³⁸ as one clinician termed it, is *not* akin to listening to an expert in their field rattle off jargon as they speak of topics of which you have no foundational knowledge, or a foreign language speaker struggling to string a sentence together in *your* native tongue, or a foreign language speaker speaking fluently in *their* native tongue (which you do not speak). Rather, much like Alice encountering the poem of the Jabberwock³⁹ ("Somehow it seems to fill my head with ideas – only I don't exactly know what they are!" [Carroll, 1960:197]), listeners describe schizophrenic speech as hard to follow, lacking information, difficult to paraphrase, being left with only a vague sense of what is being talked about, despite the speaker using recognisable words and sentence structures most of the time. In extreme cases of disorganisation, schizophrenic speech is considered to be nonsense; non-sense, literally language without meaning. Extreme or not, disorganised speech marks a failure of communication.

Schizophrenic speech has been tackled with three main objectives in mind: one, to describe what it is about their speech that deviates from normal; two, to ascertain what it is about their speech that makes it difficult to understand; and three, what it is that causes their speech to be this way. Historically, objective one has been invoked, either implicitly or explicitly, as the foundation for objectives two and three. However, objectives one and two have a somewhat complicated relationship with each other: the most obviously deviant characteristic of schizophrenic speech is that other people find it hard to understand. This interpersonal description is not very scientific, and is regarded as having little explanatory power as to etiology. Thus, there has been a consistent attempt to objectify this experience by locating deviance as a feature of the speech or language itself, or the thought behind it,

³⁸ Karl Jaspers' term (cited in Bentall, 2003:498).

³⁹ My reference to 'The Jabberwock' has significance for the topic at hand; a poem replete with neologisms, yet apparently 'grammatical', it is one of the quintessential examples of nonsense poetry in English (in fact it has even been 'translated' into other languages, including German and French). 'Nonsense' is a recognised literary device where form trumps content as the driving force (Sewell, 1952) (thus it is an extreme realisation of 'ordinary' poetry, where form partially dictates word-choice, for example [Forrest, 1968]), whether it be Lewis Carroll's invention of words (that adhere to the phonotactic rules of English), or Edward Lear's play with existing words (in sentences that adhere to the grammar rules of English, but which express a meaning that is inconsistent with our knowledge of the world).

within the schizophrenic individual (Rochester & Martin, 1979). Consequently, communication failure has been explained as a result of language deviance. Whether this is a problem in itself, or indicative of an underlying thought disorder, the reliance on the concept of a fixed code to explain ordinary, successful communication is clear. The transfer of ideas fails due to a lack of adherence to a shared code. Schizophrenic speech differs because it breaks the code's 'rules' and does not appear to contain the same 'word-word' and 'word-concept' relationships. Whether schizophrenics no longer possess the code that normals do, or simply cannot employ or access it in speech is a matter of debate, and thus there has also been intense interest in schizophrenics' language comprehension, guided by the thinking that, if they can discriminate aspects of the linguistic code in normal speakers' utterances, then their underlying linguistic knowledge must be intact.

Describing or classifying the deviance is what has taken up most researchers' time (McKenna, 2007). Accurately determining what makes schizophrenic speech unique has diagnostic implications (Covington *et al.*, 2005). Uncovering similarities schizophrenic speech may have with organic disorders (i.e. brain-damaged patients' speech) could point to underlying neuropathology (Kuperberg & Caplan, 2003). Which brings us to the way in which objective three, the search for etiology, is currently tackled: having isolated the problem within an individual, ultimately, it is supposed, the answers – as with organic disorders – will be found in the schizophrenic's brain. It is this that underpins a defining feature of the current mainstream approach to SLB. McKenna states it quite plainly: "If the mainstream view is right and schizophrenia is a biological brain disease, then its symptoms have to be explainable in these terms" (2007:256).

3.2.1 *The biomedical approach*

Cherie Marvel, in her entry for the recently published *Encyclopedia of Language and Linguistics*, 'Psychosis and Language' (2006), supplies only three proposed explanatory models for language disorder in psychosis: the *neuropsychological model*, which accounts for language disturbance in terms of underlying cognitive impairment (for example, memory, attention, and self-monitoring); the *connectionist model*, whereby a word is understood as a cluster of interconnected nodes which contribute to/represent its meaning, and semantic deficit is investigated according to normal versus abnormal activation within these networks; and the

evolutionary model, which focuses on the view that language is unique to humans, and thus on the role of hemispheric dominance in the development of language. These are clearly not mutually exclusive, but ultimately all three of these models are brain based – there is no consideration of the social dimension. All displayed linguistic behaviour is considered a direct symptom of schizophrenic pathology. The schizophrenic is portrayed as passively at the mercy of their associative networks (likely realised at the neural level), cognitive functions or other brain anatomy and physiology, i.e. all (linguistic) behaviour is a symptom beyond their control. It has no meaning beyond this – its semiotic value is purely diagnostic.

What Marvel's summary reflects is the predominantly biomedical approach to schizophrenia, and consequently schizophrenic speech, in which the "Holy Grail", as Newby (2001:344) puts it, is successfully identifying the brain pathology underlying linguistic deviance. It represents something of a revival, starting in the early 1970s, of Kraepelin's objective, descriptive approach, and thus is termed 'neo-Kraepelinian' by many (Bentall, 2003), although some critics argue that this label is misleading in that it overlooks many of the distinct differences between the modern approach, and Kraepelin's at the turn of the twentieth century (see Ungvari *et al.*, 1997).⁴⁰ This biomedical approach is predictably informed by the concept of mental illness (critics, such as Frow [2001], prefer 'metaphor' to 'concept'), which despite failing to closely match the "precision of somatic illnesses" (on which it is based) in practice (France, 2001:19), justifies its position with the assumption that ultimately, psychosis and neurosis are physiological in origin, whether the exact etiology has been discovered or not (an assumption which Kraepelin [1918], a century ago, relied upon, but with less confidence).

Frow (2001) claims that "as a result of the application of a disease model to people's talk and conduct, their beliefs and communicated experiences" (quoting Coulter [1973]), disordered behaviour is transformed into symptoms, "either as evidence of a disease process, or as the illness itself" (2001:277). With regards to schizophrenic language, then, it means that schizophrenic utterances are treated as samples, whose characteristics are quantifiable,

⁴⁰ Ungvari *et al.* (1997) accuse modern psychiatry of "operat[ing] with a highly advanced methodological apparatus such as sophisticated statistical analysis, neuroimaging and the like, while the clinical characterization of schizophrenic psychoses is almost sketchy and simplified in comparison to those of the founders of the original concept" (p.5).

recordable, objectively analysable, much like a blood sample can be subjected to testing to determine its makeup. Utterances can be 'extracted' from patients, transcribed, passed on to other clinicians to analyse, and published for wider inspection. Abnormal characteristics are considered symptoms of disease. The ability to treat language behaviour as objective, measurable data is considered progress, a shift away from the interpersonal impression, to the individual product. Linguistics then, as the science of language, is the perfect tool for this purpose. With its model of what language *should* be like, it can deftly diagnose the deviance from the norm.

Interestingly enough, it is Covington *et al.* (2005), the paper which explicitly purports to present material 'from the linguist's view'⁴¹ that illustrates this most clearly, in speaking of 'linguistic' symptoms as if they existed in and of themselves, as if speech had very little integrated function – when they mention treatment. They report that 'syntactic impairment' has been successfully treated with chlorpromazine in acute patients, and clozapine has been found to "improve the cohesion of schizophrenic patients' speech" (p.93).

Language, then, is the output of a broken brain (Bentall, 2003), a tickertape reading indicating a distressed machine. The principle author of Covington *et al.* (2005), Michael Covington, is a computational linguist, and the bias is apparent throughout. Their conclusion is, predictably, an exhortation to future research; their very first suggestion drives home the 'linguistics as science' approach:

Tools for all levels of analysis, from phonetics to pragmatics, should be computerized. Not only is the computer faster than a human analyst, *it is also free from bias*, computer analyses are *perfectly reproducible*. Recent advances in natural language processing, corpus linguistics, and computer power make analysis much easier than before. [p.95, emphasis added]

That humans would be the ones programming the computers with what to look for (a bias in itself), that pragmatics by definition (see Section 3.2.7 below) cannot be computerised, and

⁴¹ The title of their article gives the impression that linguistics is a homogeneous discipline. 'The linguist' turns out to be a doppelganger of Harris' caricatured orthodox segregationist.

if the computers' abilities in natural language processing were anything *like* natural, there *would* be ambiguities (particularly when the spoken is reduced to writing), is overlooked.

Ultimately, most research into schizophrenic speech *depends* on a belief that spoken utterances can be taken out of their interactional context, converted to written form via transcription, without losing their essential meaning or value, for this is somehow 'contained' in the utterance. In some instances, schizophrenic utterances are even translated. Furthermore, because whether investigations are spurred by a belief in an underlying formal thought disorder or simply a speech disorder, the focus is on structure/form, not content of speech (and form and content are by and large considered independent of each other), context is seen as even less relevant. Thus the standard approach to schizophrenic language ignores the principle of cotemporality.⁴² Considering the consistently documented intermittent nature of disordered speech in schizophrenics, this is even more startling.

How are these 'samples' extracted? While produced speech is usually gleaned from 'naturalistic studies' (for example, prompting the schizophrenic patient to speak by starting a conversation or asking them to describe/explain a picture, and tape-recording their utterances), language comprehension is tested by experiment, which may require a verbal response (Rochester & Martin, 1979). Kuperberg & Caplan (2003) place more emphasis on a distinction between offline and online studies. Offline methods "do not measure psycholinguistic operations at the time they occur" and tend to focus on "what linguistic representations a patient can or cannot deal with" (p.449). These often require that the patient make conscious, explicit decisions about language. Online methods have been developed relatively more recently (1960s onwards). They "require[...] a subject to make responses to ongoing language stimuli and to respond to a stimulus in a way that do[es] not require conscious consideration of the representation under investigation" (pp.454–455). Thus, offline can be said to 'tap into' final representations, while online accesses intermediate representations. Speech production is almost exclusively studied offline. It is fairly obvious that making conscious decisions about language is hardly representative of everyday language use, which is one of the reasons for developing online studies. However, this misses the

⁴² As we shall see below in Section 3.2.7, context does have a (limited and delimited) place in discussions of the pragmatic aspects of schizophrenic speech.

broader reality that the testing situation is never going to accurately *represent* the everyday language situation: it is a situation in and of itself. Lastly, speech analysis forms the basis of all major rating scales to classify patients as thought-disordered (TD) or non-thought-disordered (NTD) (e.g. Andreason's Thought, Language and Communication Scale; Chen *et al.*'s CLANG scale; Liddle *et al.*'s Thought and Language Index [cited in Covington *et al.*, 2005]).

While the starting point of investigation is the fact that schizophrenics speak strangely, the reason for testing comprehension is to determine whether the problem is actual language competence or merely performance. The underlying assumption is that comprehension and production are two sides of the same coin: encoding (producing speech) is merely the reverse of decoding (understanding speech). Thus reviewers like Kuperberg & Caplan (2003) can claim that "there is no loss of semantic information in schizophrenia...[but rather] [t]he problem appears to be one of access/retrieval and of using semantic knowledge effectively" (p.451). In other words, the fixed code must be intact in the schizophrenic's brain for them to understand others' speech; the reason their *speech* is disordered is due to interference in transmission.

3.2.2 Competence/performance

Deviance (from the norm) tends to be characterised as deficit, impairment, failure, even though the biomedical model doesn't preclude the possibility of compensation or overcompensation. So, for example, when Kuperberg & Caplan (2003) report an experiment in which TD schizophrenics, manics, and normals were asked to memorise and recall sentences, the superior performance of the TD patients in recalling randomly presented sentences (as opposed to those ordered within a coherent text) is still related within the context of a failure to use the existing organisational structure in 'encoding'. Or when they report a short-term memory task involving single words, while normals have a tendency to incorrectly 'remember' words that *weren't* originally presented to them (but are semantically related to the words that were), TD schizophrenics "fail to use semantic information to... elicit false recognitions of targets that were semantically related to the originally encoded words" (p.451). Similarly, Covington *et al.* (2005) list word approximations, neologisms, and

stilted speech as symptoms of impaired lexical retrieval – they are markers of failure, not as potentially innovative solutions to the supposed impairment.

All assessments of schizophrenic speech are based on the notion of the ideal sentence/s, generated from items in the lexicon combined with the rules of grammar and discourse, from which their utterance, or series of utterances, deviate. One gets the impression, according to this model, that the schizophrenic's brain presents a gauntlet of obstacles through which 'the message' has to pass in order to come out 'understandable', and in many cases, the obstacles prove too much to overcome. In fact, Kuperberg & Caplan (2003) identify their approach as to describe and classify language itself within a framework used by linguists and psycholinguists to describe normal language structure and processing" (p.446). This is the psycholinguistic framework that the authors champion, which involves "identify[ing] language processing deficits (e.g. semantic, syntactic) at the three basic levels of the language code: simple words (the lexical level), sentences (the sentential level), and discourse (the discourse level)" (p.447).

For tests and experiments to be viable, they need to discriminate between healthy individuals' and schizophrenics' performance. Thus the commonplace use of a normal control group in tests of SLB would seem to contradict the claim that schizophrenics are being compared to an 'ideal speaker-hearer', or their utterances to ideal sentences. However, as was established in Chapter 2, the notion of 'speech error' has its origins in the speech of normal speakers. Sledge *et al.*'s (2001) 'levels of deviance' (described in more detail in Section 3.2.5 below), whereby measurement of deficit is literally a function of how many changes are required to 'restore' the utterance to grammatical correctness, are perhaps the clearest illustration of the ideal being used as a measuring tool. Interestingly, the authors found that even normal speakers' utterances included the severest type of deviance (although less frequently than schizophrenics). While Sledge *et al.* make the somewhat bizarre claim that schizophrenics experience "an episodic failure in language capacity, i.e. competence" (p.373), the mainstream view tends to be that schizophrenic deviant language behaviour is a failure of performance, in what McKenna calls "[t]he process of finding the right words to convert one's thoughts into speech" (2007:191).

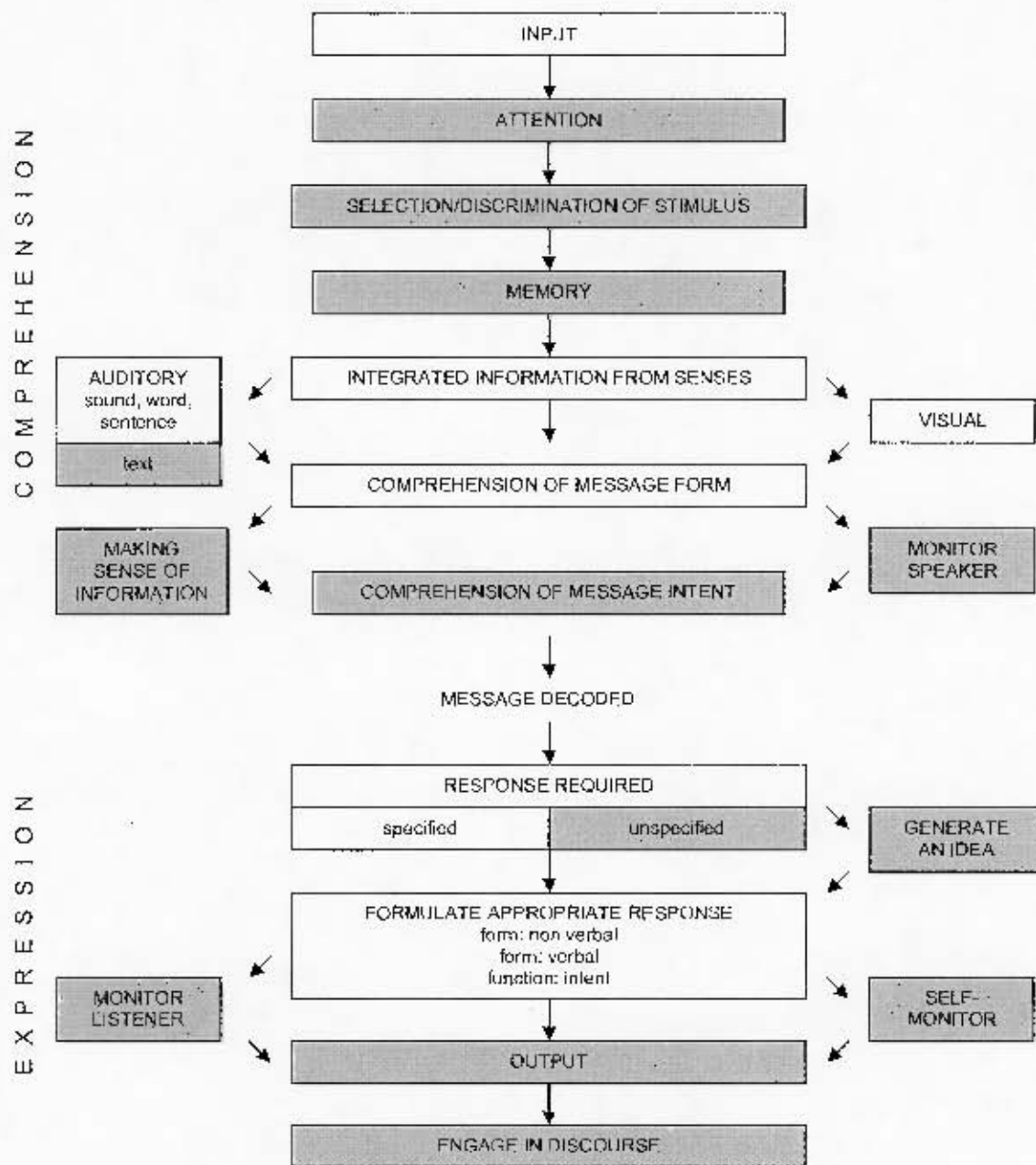
3.2.3 *The schizophrenic speech circuit*

While research on schizophrenic language has its origins in dialogue (the listener's experience of 'incomprehensibility'), this interaction is promptly erased by theoretical approaches which locate deviance solely 'within' the individual. The 'normal' listener is retained in some accounts, which explicitly invoke an embellished version of Saussure's speech circuit, the sender-receiver model, in which A has a thought, converts these concepts to sounds 'sent' to B, which in turn trigger the same concepts in B's mind when they receive these sounds, due to the possession of a shared code.

The starting point of investigation is the knowledge that B, as receiver of schizophrenic A's message encoded in sound, appears to have either confused, unusual or no thoughts triggered in their mind. It would be absurd to say that B is the one with the problem, because we know that A is sick, and/or such breakdown only occurs when B is in conversation with A (not others). Therefore A must be responsible somehow for the communication breakdown. The question is whether it is at the point of converting concepts to sounds, or the point of thought itself, or possibly even before, when A is in the role of listener before becoming a speaker. The role of the (normal) interlocutor is obscured – as listeners they are cast as completely passive receivers: they are exposed to confusing speech with unclear references; their needs are not met (Covington *et al.*, 2005); as speakers, they are transmitters of ideal speech, machine-like, neutral, to which the schizophrenic responds, inappropriately.

This line of thinking is illustrated, quite literally, by Walsh (2001), who attempts to sketch a 'communication processing model' of schizophrenic language, adapted from Christopher Frith. Her model is the inverse of the classic speech circuit, in that it runs from comprehension to expression, from 'input' to 'output', within the schizophrenic. It is reproduced here as Figure 3.1. The shaded areas indicate possible points of communication breakdown.

The diagram is accompanied by a description of various 'levels': Level 1 involves detecting/receiving the message (INPUT to COMPREHENSION OF MESSAGE FORM in



Source: Walsh, 2001:363

Figure 3.1 Model of communication processing in schizophrenics

Figure 3.1); Level 2 involves running the message ‘through’ the filter of social/world knowledge, and adding any perceiving extralinguistic clues from the speaker (COMPREHENSION OF MESSAGE INTENT to MESSAGE DECODED); Level 3 involves determining the nature of response required – if it unspecified, the hearer has to generate an additional idea, apart from just responding (RESPONSE REQUIRED); finally, Level 4 involves constructing the response using linguistic and pragmatic skills (FORMULATE APPROPRIATE RESPONSE to ENGAGE IN DISCOURSE). The disclaimer that “[t]he model is presented sequentially for illustration purposes... [and] it is important to keep in mind that processing at different levels goes on simultaneously, with levels being activated as required, depending on the complexity of the communication” (p.354) effectively undermines the model, and wisely is not dwelt upon.

The more levels requiring activation in the schizophrenic, the more likely there will be a breakdown in communication. Thus, for example, Walsh describes metaphor as involving more processing at more levels than literal language, which explains schizophrenics’ apparent tendency to struggle to understand figurative language – adhering to the orthodox notion of metaphor as being a deviation from the literal norm. Her model also adheres to the orthodox constructs of ‘message’ and ‘code’, and draws a clear distinction between linguistic and extralinguistic. Astonishingly, even while pointing out the interpersonal nature of the interaction, it is simultaneously obscured: for example, ‘response required: specified/unspecified’ is clearly jointly constructed with the interlocutor, not the schizophrenic subject alone, but it has been ‘located’ in the schizophrenic individual.

As Rochester & Martin (1979) realised, a dialogic setting makes analysis of discourse, as “connected, ongoing texts...[that are] spoken rather than written” (p.51) somewhat difficult to do. In fact, the design of their widely-cited study of schizophrenic discourse was based on “speakers who produce largely uninterrupted productions in the presence of a listener” (*ibid.*). Furthermore, “the person doing the interview made an effort not to interrupt the subject” (*ibid.*), motivated by the assumption that their “best chance of finding samples of incoherent speech was to provide a nondialogic situation” (p.52). To be sure, the authors display an awareness of “its limitation as a study of everyday language use” (*ibid.*), but considering that 30 years later this is still regarded a benchmark study of the phenomenon, forming the basic

design of modern studies (e.g. Oh *et al.*, 2002), this awareness has not been transformed into action. Conversations are interactions between at least two people, featuring stops, false starts, interruptions, requests for clarity, repetition. The test situation in studies of schizophrenic speech are geared towards *producing* the phenomenon they purport to be studying; for the interlocutor to interrupt/interfere/assist would be obscuring the data.

We return to a discussion of discourse in Section 3.2.7 below, and although it should already be apparent that the mainstream view of schizophrenic language relies heavily on an orthodox linguistic account of what language is, to drive the point home, we now turn to instances where a definition of 'language' is made explicit.

3.2.4 *Defining language*

By this point, the objection might be raised that 'the language myth' is about the construct 'a language', not language in general, which is what psychiatrists are interested in. Indeed – the notion of 'a' shared language is such a fundamental assumption it almost goes without saying. While there have been a few misguided attempts to argue for the existence of *a* schizophrenic language (Wolcott, 1970) or *langue* (Wróbel, 1990), in general, schizophrenic language is considered so puzzling because they appear to be speaking 'the same language' as the interlocutor. Thus, while the mainstream account's neglect of this matter, in acting as if a) the world was monolingual, and b) that languages are fixed and bounded entities, shall be dealt with in more detail in Chapter 5, I think it safe to assume, based on their use of terms like 'the lexicon', 'the phonological rules of English', for example, that when authors speak of 'language', they mean *the* language in which the schizophrenic and their interlocutor speak.

Where authors do find it necessary to define language (most appear to get by on the assumption that what language is is common sense [Sledge *et al.*, 2001]), they usually rely on a more-or-less orthodox linguistic account. Kuperberg & Caplan's (2003) description of 'normal' language as a "code" (p.447) adheres quite closely to what integrationists would label orthodox segregationism, and the only linguist the authors explicitly reference in this

regard is Chomsky. Their scriptist bias is apparent in the three levels of the code they distinguish: words, sentences, discourse. Sledge *et al.*'s (2001) offering is even more explicit.⁴³

Speech is a specific behaviour based on the rules of language. Language is the rule-governed system which employs discrete units of utterance (and their representation in writing) combined in a particular, systematic and rule-governed fashion in order to represent meaning. Language is conventionally divided into phonological (sound), semantic (word) and syntactic (grammar) domains. They are universal rules common to all languages as postulated by the transformational grammarians and others... [p.373]

This is a fairly clear summary of key points of the segregationist approach to language, underpinned by the language myth: languages are rule-governed, they are distinct systems, they represent meaning, the *langue/parole* distinction is invoked, speech is primary (their reference to 'sound'), and writing is merely a representation of speech, with no special characteristics or semiotic significance of its own. Their mention of the structure of language is echoed by other sources. Covington *et al.*'s introduction to their overview of the linguistic traits of schizophrenic speech is a particularly vivid example:

Since ancient times, grammarians have noticed that human language has a multi-level structure. The facts that describe any language tend to cluster into levels that make little reference to each other. Most of the phonology of any language can be described without any reference to its syntax, and vice versa. The levels interact largely through the lexicon (vocabulary), which tells us, for instance that the sound sequence /mæn/ (phonology) forms the word *man*, which is the singular of *men* (morphology), a noun (syntax) that signifies a male human being (semantics) and is relatively unrestricted as to style and connotations (pragmatics). [2005:89]

⁴³ In fact, based on this explicitly orthodox definition of language, Sledge *et al.* (2001) feel justified in making the startling claim that "[w]ith few notable exceptions... language has not been a particular focus for the study of psychopathology" (p.371). Instead, what others have studies has amounted to "descriptions of speech acts and language-related behavior" (*ibid.*).

Where and how these clustering facts are to be found we are not told; language is depicted as a type of exotic architecture discovered deep in the jungle by exploring grammarians long ago, a fairly ‘concretised’ abstraction. The scholar of language is clearly not considered to have played any role in constructing this ‘multi-level structure’.

This inevitable reference to language’s level-by-level hierarchy usually serves as an organising tool for material too (e.g. Kuperberg & Caplan, 2003; Covington *et al.*, 2005; Marvel, 2006), and yet what soon becomes apparent in longer articles is just how quickly this separation breaks down. For example, in Covington *et al.* (2005), *prosody* and *voice quality* are listed under ‘Phonetics and phonology’, the authors noting under *prosody* that “the pauses of the schizophrenic may be at least partly the result of difficulties at the semantic or pragmatic level, rather than a specifically phonological impairment” (p.90). The examples under ‘Morphology’ are evaluated as potentially “disruptions of syntax (wrong part of speech) or lexical retrieval (using words that are semantically right but syntactically off-target)” (*ibid.*). Nevertheless, they never miss an opportunity to promote the value of linguistics, and caution that prior to the 1970s (linguistics’ introduction of the field of pragmatics), “pragmatic phenomena were lumped with semantics, or simply ignored, in earlier literature” (p.92). By implication, the linguist is once again able to prove their indispensability by being able to separate out these two levels. While the authors intend this as a criticism of research antedating the involvement of linguistics as a discipline, I would argue that it is indicative not solely of conceptual or methodological flaws on the part of earlier researchers, but also of the near impossibility of extracting pragmatics from other ‘levels’. Kuperberg & Caplan (2003), at least, more readily acknowledge that pragmatics is difficult to distinguish from semantics (in fact, they claim that semantics has relevance at the three major levels of language they have distinguished).⁴⁴

3.2.5 Grammaticality

Indeed, semantics does have a tendency to ‘get in the way’. Sledge *et al.*’s (2001) attempts to isolate grammaticality from other aspects of language – in order prove impaired ‘language-

⁴⁴ Despite the authors’ repeated acknowledgement of the ‘fuzziness’ of boundaries of concepts which they employ, this is not grounds for dismissal: their chapter is still structured along the classical lines of linguistic levels.

generating capacity' – are almost comical in the lengths to which they have to go. Their concerns are that "an analysis of schizophrenic language was at risk of being *contaminated* by ideational bizarreness. A comprehensive grammar of standard English, moreover, is not available in order to decide issues of grammaticalness in every case" (p.379, emphasis added). Their aim is to measure syntactic rule violations, using a three-level rating scale "based on the degree of abstractness of the underlying structural rules violated to produce the deviance" (p.380). Level 1 is 'minimally ungrammatical', requiring change to a single word to restore grammaticality; Level 2 is 'moderately ungrammatical', whereby there are two ways that the sentence could be corrected to make sense and be grammatical; and Level 3, 'highly ungrammatical', where "the deep structure is not discernable at the level of the phrase structure" (p.382).

To their surprise, not only do normal speakers make the Level 3 deviations, but their speech sample raters ("four college undergraduates, native speakers of English, who had no prior formal linguistic or clinical experience" [p.384]) failed to achieve acceptable levels of reliability, even when the task was simplified. What they succeed in demonstrating (somewhat perversely with respect to the authors' intentions) is that grammaticality is not an essential feature of normal speech; therefore, measuring it does not enlighten one on the subject's supposed 'language-generating capacity'. Secondly, levels of grammatical deviance based on Chomskyan syntax have little reality for the lay speaker. Thirdly, grammaticality cannot be assessed or determined without reference to semantics. If the normal lay language user is the person who 'picks up on' the strangeness of schizophrenic speech in the first place, it is surely not due to what these authors construe as 'grammaticality'.

In contrast, Covington *et al.* maintain that while it may be simplified, syntax remains largely intact, quoting an example of 'word salad' from Andreason (1979): "If we need soap when you can jump into a pool of water, and then when you go to buy your gasoline, my folks always thought they should get pop, but the best thing is to get motor oil..." (2005:91), as illustration. Their appraisal of the 'incoherent' (Andreason's term) piece is that "[t]his is a wild series of changes of topic, but there is nothing ungrammatical about it, bearing in mind that people need not speak in complete sentences" (*ibid.*). At what point then, according to these criteria, *would* an utterance be judged ungrammatical, if the apparently elliptical nature

of ordinary speech can always be invoked? Their biased selection of material is apparent in that, in the very next section, on semantics, they quote from an article (Oh *et al.*, 2002) whose main conclusion – that syntactic deviance is likely a feature of both thought-disordered and non-disordered speech – they fail to mention. Again, my point is not that either Covington *et al.* or Sledge *et al.* are right, but rather that, based on similar data, and using similar supposedly scientific linguistic categories, they come to different conclusions. As Taylor maintains, grammaticality is not “a property of the sentence itself but rather of how we reflexively characterize it” (1997:23).

3.2.6 Schizophrenic semantics

When semantics is ‘extracted’ from the other levels of language, the mainstream account is, predictably, quite orthodox, whereby meanings belong to words, words have ‘core meanings’ (Covington *et al.*, 2005:94); these words and meanings are context-neutrally stored in the brain – however this semantic memory includes “representations of objects, concepts, word meanings, and their relationships” (Kuperberg & Caplan, 2003:448) from where they are accessed; in combination with pragmatic abilities, the contextually-dependent meaning of a word is ascertained; in some theories, a language’s lexicon is stored mentally as an associative network (Covington *et al.*, 2005); sentence meaning is propositional, “determined by the way the meanings of words combine in syntactic structures” (Kuperberg & Caplan, 2003:447). Ultimately, what makes something meaningful, is its adherence to the rules. Interpreting something as meaningful requires having the rules internalised and accessible.

Schizophrenic semantic impairment, then, is a deviation from this normal state of affairs. The problems that arise in extracting semantics from other levels are well illustrated by Covington *et al.*’s attempt to clarify the topic. The authors quote a patient from Oh *et al.*, ([2002:235; original authors’ insertion]2005:92): “Oh, it [life in the hospital] was superb, you know, the trains broke, and the pond fell in the front doorway”, presenting the utterance as an obvious and unambiguous example of semantic impairment. Their assessment of why it is semantically impaired differs quite markedly from Oh *et al.*’s (2002) own: “the clause ‘the pond fell in the front doorway’ is semantically deviant because the propositional features of a pond do not allow it to fall in a doorway” (p.235). Covington *et al.*, on the other hand, ask “do the words *mean* anything at all? Is the patient actually expressing a thought of a pond

falling in the front doorway?” (2005:92, original emphasis). Their answer confuses matters: “Perhaps not. Not only words, but even thoughts are semantic. That is, they encode concepts and can refer to real-world objects” (*ibid.*). In fact their statement leads one to ask whether *their* words mean anything at all – *how* exactly does a thought ‘encode’ a concept or ‘refer’ to external objects? One can only assume they are inferring some kind of mentalese, such that thinking is a form of internal symbol (consisting of a thought–concept/object pairing) manipulation. These claims are presented as self-evident.

They use this statement to tie in studies that have “suggested that schizophrenia is fundamentally a semiotic disorder, a disorder of the recognition and use of sign relations (word-to-object, thought-to-object, and object-to-object)” (*ibid.*). While the notion of a semiotic impairment is not unreasonable in itself (see Chapter 5), Covington *et al.*’s interpretation of it is: a schizophrenic’s words at times have no meaning, because they express/stand for thoughts that have no meaning. Their thoughts have no meaning because they fail to encode concepts or refer to real-world objects. But whether they are determining if the individual words have meaning, or whether the words strung together have meaning is not clear. In addition, do they mean a lack of meaning for the schizophrenic, the listener, or just meaning in general? Their theory of semantics comes across as a (con)fusion of Chomskyan rules operating on fixed-meaning symbols, intentionality, and truth-conditional semantics.

Neither Oh *et al.* nor Covington *et al.* find it necessary to entertain the possibility that the patient perhaps has delusional beliefs about ponds, or that they said *pond* when they really meant something else. My point is not about the patient’s intention, nor the authors’ correct or incorrect interpretations, but rather that the classification ‘semantic deviation’ is interpretation in the first place.

3.2.7 Schizophrenic pragmatics

The general consensus in mainstream accounts of SLB is that it is the higher levels of language that are more often affected (Covington *et al.*, 2005; Marvel, 2006; McKenna, 2007). The definitions of what exactly constitutes these higher levels are less clear and overlapping than discussions of the lower levels – one can tell that the boundaries of what counts as

'linguistic' are being touched upon. In fact, I would argue that this is where much of the confusion as to whether SLB is indeed a speech or a thought disorder originates.

Kuperberg & Caplan (2003) conceive of the discourse level as including "information about the general topic under discussion, the focus of a speaker's intention, the novelty of the information in a given sentence, the temporal order of events, and causation" (p.448). For them it clearly forms the boundary between linguistic and extralinguistic: its "structure and processing... involve many nonlinguistic elements and operations, such as logical inferences, as well as more purely linguistic operations" (*ibid.*). Pragmatics, on the other hand, as "social and real world knowledge" (p.448), is definitely extralinguistic, although its boundaries with semantics are blurred.

Covington *et al.* (2005), too, view pragmatics as not-quite-language, calling it "the relationship *between* language and context" (p.92, my emphasis). 'Context' emerges from their discussion as co-textual (discourse structure: its cohesion and coherence) and social (conversational rules/structure), whereas Kuperberg & Caplan focus almost exclusively on the co-textual. While the inclusion of the role of context may seem a deviation from the stance incorporated by the language myth, it is very clear that *what counts as context* is set out in advance, and becomes another rule against which deviant speech can be measured. This is particularly apparent in Covington *et al.*'s discussion of the violation of Grice's maxims.

"Talking is a cooperative human activity" (2005:93) we are told – a nod to the interpersonal nature of speech – but schizophrenics are uncooperative in this respect. This introduces the odd claim that "Grice's maxims [of effective communication] do not function normally in schizophrenia" (*ibid.*). The maxims are presented as strict rules, which "[m]ore than any other area of pragmatics... involve extralinguistic conscious thinking" (*ibid.*). A maxim would seem by definition not to be something which can *function*, as such. After all, these are a set of principles not describing what people do, but a summary of what we expect others do to, and what we assume others expect of us. Schizophrenics' failure to "follow the maxims when producing speech" (*ibid.*) is not clarified. For all we know, schizophrenics continue to follow the maxims, but cannot ascertain how much information is adequate, and how much is too much, or whether what they consider to be truthful, may not hold for their

interlocutors. Grice's maxims are completely contextually based – what counts as adherence to them is not given in advance. Failure can only be judged by the participants of a situation.

Beyond this, Covington *et al.* have misrepresented the argument of De Decker & Van de Craen (1987), whose work they are summarising. If one reads the original piece, it is clear that the authors are speaking not about conversation in general, but conversation in the therapeutic setting. They are not making claims regarding the general structure of schizophrenic speech. In fact their conclusion is that Grice's maxims are of little relevance in the schizophrenic therapeutic setting, and holding to them obscures what the patient is really trying to communicate. This misrepresentation is highly significant in terms of the point being made here. This is one of the Covington *et al.*'s few references to a work that does not approach schizophrenic language from the purely biomedical perspective (it is titled 'An Interpersonal Theory of Schizophrenia', although De Decker & Van de Craen do introduce the concept of hemispheric over-activity in the second half of their paper), and it is grossly misrepresented to fit in with the dominant view of language as being rule based, and schizophrenic language as rule breaking.

Lastly, their claim that "pragmatic phenomena were lumped with semantics, or simply ignored, in earlier literature" (2005:92) is more than a little odd; as we shall see in Chapter 4, from the very earliest reports on schizophrenic language, its 'lack of fit' with context and inappropriateness to the situation has been highlighted, albeit without use of the term 'pragmatics'.

Psychology has operationalised this pragmatic ability to an extent as the construct 'theory of mind' (TOM). Defined as the ability (or more specifically, a "cognitive mechanism" or module evolved in the human's 'social brain' [Burns, 2007:136]) to "represent one's own mental state... and also, crucially, the mental states of others" (McKenna, 2007:257), it has a role in "facilitating interpersonal communication" (Burns, 2007:136). Evolutionarily speaking, while limited TOM skills are found in apes, full TOM skills are the possession of humans alone (Burns, 2007). Originally developed by Frith in the context of autism, in schizophrenia, impaired TOM is implicated in negative symptoms (due to "lack of awareness...of own mental and emotional states and a corresponding unawareness of personal goals and

intentions”); incoherence in speech and language (“failure to take account of the listener’s lack of knowledge”); and positive symptoms like delusions (residual TOM knowledge – as a once-functional adult – leads to *false* inferences, which can manifest as paranoid beliefs or delusions about ‘receiving messages’) (p.137).

Schizophrenics tend to perform poorly on tests measuring TOM; however, one recent study (McCabe, Leudar & Antaki, 2004) found that TOM skills remained intact in chronic schizophrenics, despite the persistence of delusions, and the realisation that these were not shared by their healthy interlocutor – thus, as a model, TOM is not beyond reproach. In addition, some refute that it is a domain-specific module of the brain, and invoke a broader system of integrated cognitive functions called ‘existential TOM’ (ETOM) “that allows individuals to perceive meaning in certain life events” (Bering, cited in Burns, 2007:148), defining a meaningful life event as “one that implies purpose or intention as the causal force” (p.148). Thus language use would be included in this definition.

3.2.8 *Written language*

Not surprisingly, research into SLB displays the same curious paradox surrounding written language as does orthodox linguistics. Despite a few oblique references to schizophrenics’ written communication, material covered by the three reviews (Kuperberg & Caplan, 2003; Covington *et al.*, 2005; Marvel, 2006) reflects that the overwhelming majority of research centres on schizophrenics’ speech (and yet, that for purposes of analysis, their speech is always converted into a textual product is not considered problematic,⁴⁵ reinforcing the belief that writing serves only to record speech). And in the very few articles that do assess schizophrenics’ written language, their adherence to an orthodox account of writing is absolute.

A case in point is Herbert & Waltensperger’s (1980) motivation for deciding to restrict their focus to “a written corpus... of letters written by the subject to his psychiatrist over [a] three-year period... *because of the greater reliability of the transcribed written data*” (p.82, emphasis

⁴⁵ One might ask, on a practical level, how things could be done differently. Surely including a tape-recording, or even video-recording, were it feasible in the academic publication context, would still amount to extracting and abstracting from the flow of communication? My point is less that it should be *done* differently, than that the context of transcription should be *thought* about differently, and seen for what it is.

added). The authors qualify this assertion by explaining that “the transcription of oral data is complicated by the subject’s more frequent use of neologisms in speech and the general problem of the transcription of suprasegmentals, essential to the character of schizophrenic speech” (1980:82–83). Finally, that “the primary use of written data should, in principle, provide more direct access to the schizophrenic’s ‘competence’ as opposed to the initial performance characterizing schizophrenic speech” (p.83) is presented as common sense, and the authors see no need for further justification. Quite simply, writing is a more accurate reflection of what goes on in a person’s mind, and contains less of the ‘noise’ present in speech.

Having noted clear differences between the modes of writing and speech, Herbert & Waltensperger proceed to treat this as having little significance when it comes to grammatical structure – a mode-transcendent feature of language. The authors have no qualms about re-transcribing the subject’s written output, whatever their misgivings about converting speech into a textual product. Although they describe some of the features of his original letters, including inconsistent spatial organisation and orthography, and note that “[t]he varying appearance of the subject’s letters may be correlated with his emotional state at the times of their composition, but there is no way of verifying this interpretation” (p.84),⁴⁶ again these features are tacitly dismissed as not central to their concern, which is grammatical structure. In addition, there is little consideration given to the broader communicational situation, for example, was the therapist writing back to the patient?

Although Herbert & Waltensperger constitute an exception to the rule which declares speech alone of importance when it comes to schizophrenic language, nonetheless, the actual research process relies heavily on the written form, and subsequently, schizophrenic utterances are treated as ‘texts’ to be analysed. Lastly, in the context of testing, despite a few indications that whether material is presented visually or orally makes a difference to schizophrenics’ comprehension (e.g. De Lisi, 2001:492; Kuperberg & Caplan, 2003:454), this point is usually overlooked in test design, or barely mentioned as a consideration when

⁴⁶ They add that “the content of all letters is similar; there is no evidence of increased paranoia in the context of the more disordered arrangements” (p.84), and thus make their double standard clear. That the subject’s mental content/mental state can be directly inferred from the textual product (language reflects thought) is unproblematic, but to infer emotional state from orthography must remain pure speculation.

discussing results (from passing references one can glean that research may take the form of a pencil-and-paper test, spoken response, or even pushing buttons). It is clear that researchers regard language as language, whatever the medium; the essentials of speech (structure) are captured by writing, and writing has no semiotic significance beyond recording speech.

3.2.9 *Formal thought disorder*

Formal thought disorder (FTD) forms the centrepiece of most accounts of schizophrenic language. As we shall see in Chapter 4, the term has come under repeated attack, but remains in use today. It is “a disorder in the *form* of thought, not the *content*” (Covington *et al.*, 2005:86, original emphasis), which focuses on “the way ideas, sentences, and word are put together” (Kuperberg & Caplan, 2003:445). Most reviewers of theories of SLB equate the phenomenon with formal thought disorder. None draw particular attention to the fact that disorders of language have been found in both thought-disordered (TD) and non-thought-disordered (NTD) schizophrenics (e.g. Rochester & Martin, 1979; Oh *et al.*, 2002). McKenna (2007), for example, discusses speech disorder exclusively within the context of formal thought disorder, of which he gives the following account:

The simplest cognitive neuropsychological explanation of thought disorder – which is so simple that few have ever subscribed to it – is surprisingly well supported. Thought-disordered schizophrenic speech features genuine linguistic abnormalities and cannot always be distinguished from dysphasia. But at the same time, there are features such as intact comprehension and sparing of naming that make it different from any neurological form of fluent dysphasia. Nor is language disturbance the whole story. [...] There is of course no reason why language abnormalities should not combine with an executive impairment, especially in a disorder where the pathological process is reputed to involve both the temporal and frontal lobes [p.257]

While authors will in passing mention studies that have distinguished between TD and NTD schizophrenics, and emphasise that speech does not have a one-to-one relationship with thought, ultimately, their argument rests on the fact that disorganised speech is a reflection

of disorganised thinking (whatever that means). Marvel (2006) actually characterises negative FTD as “impoverished thought *content*” (my emphasis) and maintains, that despite the debate, “[i]t is nevertheless uncontroversial that linguistic disturbance in schizophrenic speech follow a general pattern of anomalies that are related to the presence of FTD” (p.14). Kuperberg & Caplan (2003) introduce the problematic nature of ‘thought disorder’ (they distinguish between formal and content, and claim in practice these tend to be blurred), but proceed with the assumption that it is just another term for disorders of speech output and processing.

Covington *et al.* (2005) warn that “[i]n the psychiatric literature, many of the abnormalities of language in schizophrenia are lumped together as formal thought disorder” (p.86); the implication is that the linguist will be more discerning. However, the authors proceed to then lump all features of FTD under ‘language disorder’ by virtue of the fact that there is linguistic terminology to describe the phenomena. Adherence to the belief that FTD is primarily responsible for disorganised speech is not possible without some notion that speech is first planned, then executed. If speech is the “reading off of a mental text” (Taylor, 1997:52), underlying FTD points to the ‘writing’ of the mental text that goes awry, while speech disorder hypotheses focus on the ‘reading’.

One of the standard tools used to determine whether a schizophrenic is thought-disordered is Nancy Andreason’s Thought, Language & Communication Scale (cited in Covington *et al.*, 2005; Marvel, 2006), based on the 18 types of disorder she identified in a separate paper (Andreason, 1979). Bentall (2003) summarises these types in a table reproduced here (Table 3.1). Her groundbreaking work aimed to overcome some of the difficulty in identifying the ‘strangeness’ that characterises psychotic speech. Crucially, Andreason demonstrated that FTD is not unique to schizophrenia – manics also display numerous of these traits in their speech. Despite this revelation 30 years ago, it is almost completely ignored even in the very latest reviews (Kuperberg & Caplan [2003] do however report mixed findings). Perhaps the disease model of schizophrenia cannot make sense of the fact that a supposedly central symptom of a disease is not unique to it.

Table 3.1 Andreason's (1979) main types of thought, language and communication disorder

Type of disorder	Definition	Example
Poverty of speech	Restriction in the amount of spontaneous speech. Replies to questions are brief and concrete.	
Poverty of content of speech	Speech that conveys little information. Language is vague and over-abstract.	
Pressure of speech	An increase in the amount of spontaneous speech compared to what is considered customary.	
Distractible speech	During mid speech, the subject is changed in response to a stimulus.	'Then I left San Francisco and moved to... Where did you get that tie?'
Tangentiality	Replying to questions in an oblique, tangential or irrelevant manner.	Q: 'What city are you from?' A: 'Well, that's a hard question. I'm from Iowa. I really don't know where my relatives came from, so I don't know if I'm Irish or French.'
Derailment	Ideas slip off the track on to another which is obliquely related or unrelated.	'The next day when I'd be going out you know, I took control, like uh, I put bleach on my hair in California.'
Incoherence (word salad)	Speech that is incomprehensible at times.	Q: 'Why do people believe in God?' A: 'Because making a do in life. Isn't none of that stuff about evolution guiding isn't true any more.'
Illogicality	Conclusions are reached that do not follow logically (non sequiturs or faulty inductive inferences).	
Clanging	Sounds rather than meaningful relationships appear to govern words.	'I'm not trying to make noise. I'm trying to make sense. If you can make sense out of nonsense, well, have fun.'
Neologisms	New word formations.	'I got so angry I picked up a dish and threw it at the geshinker.'
Word approximations	Old words used in a new and unconventional way.	'His boss was a seeover.'
Circumstantiality	Speech that is very indirect and delayed at reaching its goal. Excessive long-windedness.	
Loss of goal	Failure to follow chain of thought to a natural conclusion.	
Perseveration	Persistent repetition of words or ideas.	'I think I'll put on my hat, my hat, my hat.'
Echolalia	Echoing of others' speech.	Q: 'Can we talk for a few minutes?' A: 'Talk for a few minutes.'
Blocking	Interruption of a train of speech before completed.	
Stilted speech	Speech excessively stilted and formal.	'The attorney comported himself indecorously.'
Self-reference	Patient repeatedly and inappropriately refers back to self.	Q: 'What's the time?' A: 'It's 7 o'clock. That's my problem.'
Phonemic paraphasia	Mispronunciation; syllables out of sequence.	'I slipped on the lice and broke my arm.'
Semantic paraphasia	Substitution of inappropriate word.	'I slipped on the coat, on the ice I mean, and broke my book.'

Source: Bentall, 2003:384-385

While Andreason doesn't make use of linguistic terminology in her descriptions, hers is broadly a pragmatic or discourse-based assessment of psychotic speech. Words like 'goal', 'off the track', 'conclusion' indicate a belief that normal speech follows a particular discourse plan, with a pre-set goal; psychotic speech may start with this plan, but gets derailed or disrupted. The reason for the interlocutor's confusion is firmly located in deviant speech; schizophrenics appear unable to follow not the rules of language, but conversation. What is of particular interest to integrationists is that most of these descriptions are actually interpretations – the use of words like 'inappropriate', 'unconventional', 'vague', 'incomprehensible', 'irrelevant', 'unrelated', 'natural' indicate an assessment at a metalinguistic level, which could not be made without the engaged involvement of the interlocutor. And although characterised as an assessment of the *form* of language/thought, assessment can only be achieved by simultaneously evaluating the *content*. Ultimately, that the lack of objectivity makes it no less useful a tool in assessment is significant.

3.2.10 *Language evolution*

As mentioned in Section 3.2.1, the evolutionary hypothesis posits a link between the origin of psychosis and the origin of our capacity for language as humans. In a nutshell, theories such as Timothy Crow's (1997), attempt to account for the fact that despite the fitness and reproductive disadvantage that schizophrenia confers on an individual, the disease persists in the population, and has a relatively stable incidence across the world. Thus whatever genetic mutation gave rise to the possibility of psychosis must have resulted in a benefit that outweighs this cost, and have occurred at the dawn of our species. It is likely linked to the genetic coding for that which many consider the distinguishing feature of our species – our capacity for language, enabled by hemispheric lateralisation, in which the two brain hemispheres are specialised according to function. It is not surprising then, that schizophrenics display language abnormalities. In Crow's formulation, 'schizophrenia [is] the price *Homo sapiens* pays for language'.

Crow's hypothesis depends on the assumption that "our species arose suddenly and decisively, thus marking a distinct separation from our hominid ancestors" (Burns, 2007:58) and he also "relies upon [this] discontinuity in evolution to explain the emergence of language" (*ibid.*) and thus psychosis in humans. Accordingly, language is different from any

communication system that came before it, distinguished by its generativity, what Crow (1997) defines as “the capacity for recombination” (p.133), and arose due to specialised language areas in the brain; it is largely autonomous from other functions or ‘modules’. To make his case, Crow explicitly builds on two of the cornerstones of orthodox, psycholinguistic linguistics: Chomskyan generativism and Saussurean signs.

Although one hemisphere is dominant (usually, the left), “[l]anguage... is a whole brain function” (p.134); there are areas in both hemispheres dedicated to a particular aspect of language, which are linked via commissural connections. These two aspects of language are its temporal and its spatial characteristics respectively. The temporal, one-dimensional linear phonological form of language is located in the dominant hemisphere, while the spatial, two-dimensional, logical form is located in the non-dominant. According to Chomsky, the logical form “represent[s] the assembly of the lexical and syntactic components of the sentence” while the phonetic form is the sentence’s “phonetic expression” (p.135). Furthermore, “[l]ogical form precedes, and interacts with, phonetic form” (*ibid.*). A related theory which Crow draws upon is Paivio’s idea that “cognitions exist in two interconnected forms – verbal (‘logogens’) and non-verbal (‘imagens’)” (*ibid.*). The former corresponds with the dominant hemisphere, and the latter, the non-dominant. Crow presents these ideas as essentially technical revisions of Saussure’s definition of the sign, whereby the ‘logogens’ or phonetic expression is the signifier, and the ‘imagens’ or logical form is the signified. The spatial arrangement of the non-dominant hemisphere allows for parallel processing (which saves time), but finally its information needs to be ‘sent’ to the dominant hemisphere to be converted into linear form.

Predictably, in schizophrenia, with a lack of hemispheric specialisation, this process goes awry. One theory is that “the left hemispheric consciousness becomes aware of an influence from an ‘external’ force, which in fact, is the right hemisphere” (p.137) which leads to the Schneiderian first-rank symptoms (detailed in Chapter 1 on page 11) of delusions of control and thought insertion. Thus for Crow, these symptoms provide “clues to the cerebral organisation of language”, and their “significance... is to chart out the boundary conditions of language, to depict language ‘at the end of its tether’” (*ibid.*).

Crow then goes on to speculate as to the details, wholeheartedly dealing in some of the prime misconceptions which integrationists have sought to dispel:

A feature of human language is that it is a two-way system – sounds are decoded and generate meaning, and meanings are encoded into sound – the so-called ‘bi-directionality of the Saussurean sign’ (Hurford, 1992). The general principle of linguistic communication is that symbols are held in common by speakers of a given language, and by means of the bi-directional mechanism can be used as exchangeable tokens. However, as Hurford points out, there is a class of words, the deictic (or indexical) pronouns ‘I’ and ‘you’, for which this is not true. The referent is not fixed, and in the course of a two-way conversation, the meaning to be attached to these symbols must be switched back and forth, according to whoever is the speaker. It is an aspect of this process that has become deviant in association with the first rank symptoms – meanings and intentions that are internally generated are attributed to another person or outside agency [p.137]

Hemispheric specialisation for the components of language function achieves completion at about the time an individual reaches sexual maturity. Crow & Done “speculate that it is those in whom this process is delayed or incomplete who are at risk of psychotic illness” (1997:66). From this perspective then, it might seem that people who go on to become psychotic have never reached full linguistic competence. The authors argue the opposite – that schizophrenics actually have a superior capacity to generate complex sentences, but “later encounter inflexible limits” (p.67) in language production – although they use pre-schizophrenic children’s *written* essays (retrospectively) as evidence. Considering the study reported by De Lisi (2001) in which “when given a writing task, patients with schizophrenia wrote with as much complexity as controls, yet their speech, which depends on working memory and attention for focused fluent production, was less complex than that of controls” (p.492), it could be argued that recognising the distinction between writing and speech is of crucial importance to Crow & Done’s theory.

Nevertheless, to summarise their position:

those predispositioned to psychosis have a genetically determined mismatch between their capacity to generate linguistic structures (sentences or discourses) of a target level of complexity and an informational channel (possibly inter-hemispheric) through which this information passes [1997:68]

Ultimately, then, schizophrenic linguistic difficulties are characterised as an information-processing difficulty. Schizophrenics have trouble getting information ‘out’, which leads to confusion within.

Crow and his colleague’s theory gives a rather brilliant account of the existence of hallucinated voices, and in contrast to most mainstream accounts, ties this in with theories of language disorder, rather than treating them as two separate phenomena. What his theory doesn’t account for though, is the *content* of the voices – why are they so often persecutory, for example? Nevertheless, the implication of his theory is a combined explanation for Schneiderian first-rank symptoms (delusions about one’s thoughts, auditory hallucinations) in terms of failed or incomplete hemispheric differentiation, and the deviant form of schizophrenic speech (like lack of syntactic complexity). In fact, the nuclear symptoms of schizophrenia are explained ultimately as the *result* of language disorder (Crow, 2000). Language is pushed to the forefront as a key to unlocking the mystery of schizophrenia.

4. THE CHANGING CONCEPT OF LANGUAGE IN SCHIZOPHRENIA

Having established the current mainstream view of SLB, and its language myth bias, one is prompted to ask the question that chips away at the inevitability with which most ‘facts’ are presented: “Has it always been this way?”, which is closely tied to: “Is this the only way of approaching it?” While the answer to the latter should already be clear within the context of this thesis, the answer to the former in this case is both ‘yes’ and ‘no’: the seeds of the current dominant approach can be found at the inception of the disease as a unitary concept (and even before this); however, at this time, a number of other ideas (now discarded) were of equal standing. The section begins with the works of Emil Kraepelin (the first to group a collection of symptoms together as a disease he called *dementia praecox*) and Eugen Bleuler (who coined the term ‘schizophrenia’ to replace Kraepelin’s ‘*dementia praecox*’). It then continues through the studies in the first half of the twentieth century, to the early 1960s, which marked a watershed moment both for linguistics as a discipline, and studies of schizophrenia, for different reasons (the triumph of generative linguistics for the former, the introduction of antipsychotic medication for the latter). The 1970s saw the first linguist investigate schizophrenic language,⁴⁷ which broadened interest in the phenomenon and generated fierce debate well into the 1980s. By this stage, new-generation atypical antipsychotic medication and advances in brain imaging technology reinforced the burgeoning biomedical approach to language, and it is at this point that psychiatry’s version of linguistics and language became cemented – it is very rare to find references to linguistic theory dating after the 1970s even in mainstream schizophrenia work published recently. An oversimplification perhaps, but there is a sense in which Chomsky cracked the code, and to fill the gaps, there’s Grice on pragmatics and Halliday & Hasan on discourse cohesion – a clear-cut instance of what Harris terms the “fixed-code plus” approach to language.

4.1 The early years

Although Kraepelin and Bleuler were contemporaries, Anglo-American psychiatry did not gain access to their works simultaneously; Kraepelin’s text was translated into English in

⁴⁷ This oft-repeated ‘fact’ is something of a myth itself, if one considers that, as Jenkins (2004) reports, Edward Sapir had close ties to Harry Stack Sullivan and touched on schizophrenia in his own work.

1919 (in Britain), but it was more than 30 years later that Bleuler's monograph received the same treatment (in the United States).⁴⁸ In any text on schizophrenic symptoms, the author's beliefs about language and the mentally ill are revealed as much by the content of their work as by the form. Thus particular attention will be drawn to the way in which descriptions of the linguistic features of schizophrenia are organised. While in some ways it is unfair to compare an entire monograph on a subject with what is essentially just a chapter extracted from a larger work, Bleuler's treatment of the disease – and the role of language in particular – is both quantitatively and qualitatively different from Kraepelin's. Even a quick page-through of the books gives one an impression of the differences. Littered with graphs, diagrams, writing samples, even photographs (mostly of patients), Kraepelin's work exemplifies his biomedical scientific leanings. His few chapters, studded with umpteen subheadings, read like a catalogue of symptoms. Bleuler's work, on the other hand, is a carefully structured argument. No illustrations to embellish or explain, but rather an attempt to introduce us to a strange world, populated by unique characters. That the same phenomenon or symptom appears under different categories is testament to his more integrated approach.

Kraepelin and Bleuler provide a description of similar phenomena; but their descriptions are infused with interpretation, explanation, assumption (indeed, it is debatable whether there is such a thing as a 'neutral' description of a symptom – one of the central themes of this thesis), and this is where their differences become apparent. Both believed in an underlying biological cause, but for Bleuler, this didn't preclude a psychological explanation for symptoms and their relationships with each other. Despite their differences in approach, there remains an underlying similarity in their broader conception of language, and its relation to thought.

Most of Kraepelin's discussion of all things linguistic is confined to his chapter on 'psychic symptoms' (as opposed to 'bodily symptoms'); thus the organisation of his text conforms neatly to the Cartesian mind-body split, with language clearly disembodied, a psychological

⁴⁸ The place of publication is more likely indicative of a receptive audience, and not the reason why Kraepelin's influence held sway in the UK while American psychiatry (primed by exposure to Freud) followed the Bleulerian tradition, up until the latter half of the twentieth century.

property of the individual. Within this chapter, he doesn't seem to find the unsignalled, almost imperceptible shifts between discussions of thought and speech/writing problematic, and a distinction between these categories is made occasionally, and not as a rule. It is taken as given that the only access we have to thoughts is through speech or writing, which in turn reflects thought, for the most part, fairly accurately.

Earlier, he introduces his second chapter with the following:

The complexity of the conditions which we observe in the domain of dementia praecox is very great, so that their inner connection is at first recognizable only by their occurring one after the other in the course of the same disease. [p.5]

He is not working at the level of individual patients, but of the disease itself (and this is an approach evident throughout his work – once a patient is diagnosed as suffering from 'dementia praecox', all their behaviour is potentially evidence of it). The concept of 'the same disease' thus forces the search for 'inner connection' between conditions. However, because it is Kraepelin's contribution to medicine that these conditions *do* form one disease, this premise goes unquestioned, and it is with the search for 'inner connections' that Kraepelin chiefly concerns himself. That the search is usually fruitless emerges as one of his defining characteristics of the disease. We are not told here what exactly constitutes an 'inner connection', but a meaning can be extrapolated from his repeated use of the term.

His inner/outer dichotomy is worth spelling out. 'Inner' refers both to within the mind (not directly accessible by others) and what is 'intrinsic', although the two senses are not unrelated. Outer is related to what can be perceived directly by the observer's senses (i.e. sounds, forms of writing), and is extrinsic. Thus there is a distinction between concepts and the forms which house them when expressed – connections between the former are essential, between the latter, peripheral or arbitrary. A foregrounding of the peripheral at the expense of the essential results in pathological speech or writing of which there is little hope of making sense.

Bleuler (1911[1950]), on the other hand, divides symptoms up into the categories 'primary' and 'accessory', whereby the latter arise out of the former – thus the clinical picture of the disease is a combination of the two. Although there is a linguistic dimension to various of his categories, speech and writing in and of themselves are discussed as an accessory symptom. The disturbance of association, for Bleuler, defines the disease, and is the symptom from which all others stem. Associative threads, which ordinarily "guide our thinking" (p.14), can be "disrupted" (*ibid.*), singly or as a group, they can be "ineffective" (p.17), even disconnected. Ultimately, associations established by experience no longer hold sway or dominate, they are "loosened", allowing for novel associations to intervene or appear. Thus thinking is illogical because it follows associations that deviate from "those which experience has taught us" (p.80). The impression with which the schizophrenic's interlocutor is left is of a general idea perhaps, but no clear purpose or goal.

Neither Kraepelin nor Bleuler spend much time discussing formal aspects of language structure, although these do secure a mention. Although Bleuler dedicates a substantial section to disorders of speech and writing, for the most part, he contends that "[t]he abnormality does *not lie in the language itself*, but rather in its content" (1950:147, emphasis added) – under this he includes "blocking, poverty of ideas, incoherence, clouding, delusions, and emotional anomalies" (*ibid.*). He does make note of grammatical errors, which he calls paragrammaticisms:

A special confusion is introduced into speech by the fact that ideas designated by correctly chosen words are distorted by the structure of the sentence. Also, in the construction and use of neologisms patients may select the correct root but vitiate the meaning by use of incorrect suffixes, conjunctions, etc. [pp.152–153]

Thus neologisms, in some cases, are blurred with grammatical anomalies. Kraepelin describes similar linguistic features under "disorders of internal speech, of the transformation of ideas into linguistic movements of expression" (1918:67), a much broader category than Bleuler's 'paragrammaticisms'. Although this is not explained, one gathers from the paragraphs that succeed it that this is an intermediate stage between thinking and actual vocal speech production. This includes word-finding difficulty, word fusion, word

substitution, neologisms, which he defines as “senseless collections of syllables, here and there still having a sound reminiscent of real words” (p.68), some of which perhaps express “more complicated or morbid ideas, for which no words exist” (*ibid.*), and finally gibberish. Related to this is what Kraepelin calls ‘akataphasia’, where the appropriate expression of thought cannot be found, and something similar is uttered instead. Disorder extends in some cases to sentence construction, manifest in disturbed syntax, a telegram style, which may degenerate further into complete lack of sentence-formation.

For Bleuler, most ‘linguistic’ features are described in terms of their relation to other actions or behaviour. So, for example, depersonalisation may lead to patients losing track of time and space, and their self – thus instead of labeling these patients’ speech as ‘displaying an incorrect use of pronouns’, their speaking of themselves in the third person is contextualised as “the expression of a real alteration in personality” (p.144). One example which contradicts this approach is what Bleuler claims is a misuse of auxiliary verbs, whereby patients display a confusion between “to be” and “to have”, so that “I am England” means “England belongs to me” (p.153).

Kraepelin, on the other hand, whether illustrating anomalies of language or thought, tends to treat utterances as decontextualised symptoms. A typical example:

The most different ideas follow one another with most bewildering want of connection, even when the patients are quite quiet. A patient said “Life is a dessert-spoon,” another, “We are already standing in the spiral under the hammer,” a third, “Death will be awakened by the golden dagger,” a fourth, “The consecrated discourse cannot be over split in any movement,” a patient, “I don’t know what I am to do here, it must be the aim, that means to steal with the gentlemen. [p.57]

To be sure, it is difficult to imagine the circumstances in which such individual utterances may have occurred. Yet their complete divorce from context (both co-linguistic and extralinguistic) makes them seem especially bizarre. Having already classified the utterances

as demonstrating a complete 'want of connection', Kraepelin sees no need to contextualise them, and simply reels them off as examples of deviant discharge.

Both Kraepelin and Bleuler do mobilise 'context' to explain the deviance of schizophrenic speech, particularly in excited states. Kraepelin notes "a prodigious flow of talk" (p.56) in patients "which does not correspond to a need for expression, but usually unburdens itself without any reference to the surroundings" (*ibid.*). Similarly, Bleuler observes that

For the most part, they do not thereby want to convey anything to, or communicate with their environment. Their thoughts are transformed into speech, without relation to the environment. Or such a relation may be entirely one-sided, as when a patient asks a question which is somewhat suited to his interlocutor but shows no need for an answer; he gives us no time for one, nor does he listen. The presence of a person often serves as a stimulus to mere speech activity, not as a motive for saying something. Many patients are constantly uttering chains of words; they talk but do not say anything. [p.147]

Anomalies of vocal speech production too (speed, rhythm, cadence), which Kraepelin calls 'derailments'⁴⁹ of linguistic expression' are characterised as deviant due to their lack of fit: "individual peculiarities of vocal speech are changed without relation to each other or to the psychic occurrences by which they are usually ruled" (p.66).

For Kraepelin, ultimately much of what schizophrenics say is meaningless deviance. Bleuler maintains it only *seems* that way:

The emergence of an idea without any connection with a previous train of thought, or without any external stimulus, is... so foreign to normal psychology that one is obliged to look even in the patient's seemingly most far-fetched ideas, for the associative path originating in a previous concept or in an external stimulus." [1950:22]

⁴⁹ 'Derailment' here has a markedly different meaning to Andreason's (1979) employment of the term.

Meaning is there for the finding, although this may be an almost impossible task for the clinician.

Both Bleuler and Kraepelin regard speech as an expression of thought, but don't assume a one-to-one relationship between the two. Abnormal speech is not necessarily an indication of abnormal thinking. As already mentioned, Kraepelin distinguishes between 'derailments of linguistic expression' and 'disorders of internal speech'; his third point of breakdown is in the train of thought itself. Bleuler, too, draws a distinction between 'misdirected talking' and 'misdirected thinking', or linguistic versus conceptual disturbance.

What Kraepelin considers a case of "[t]he feeling of the disease tak[ing] on insane forms; the brain is burned, shrunk, as if completely gone to jelly, full of water, the mind is 'drawn like rags from the brain'; the patient 'has only a little knuckle of a brain left'; the nerves are teased out. The tongue is made of iron..." (1919:26), Bleuler describes as a case of metaphorical language actually altering thought, resulting in bodily delusions: "Their bones have turned liquid; their hearts have turned to stone. (Change from the originally symbolic to the literal meaning.)" (1950[1911]:123). Similarly, what Kraepelin would describe as distraction by 'outer' properties of words ("linguistic constituents" [p.19]), due to "a failure of attention" (p.20), and consequent communication breakdown (resulting in "a completely unintelligible and aimless series of words and fragments of thoughts" [*ibid.*]), Bleuler characterises as an actual change in thought, allowed by the loosening of association – "the concepts themselves are altered" (1950[1911]:76).

He counters the notion that in schizophrenia, "words lose their meaning until there remain mere chains of word-husks" (p.150), claiming that, for the most part, patients produce "striking words and phrases", which "can hardly be looked upon as empty shells but rather as shells which conceal a content different from the usual" (*ibid.*). Bleuler also describes what he perceives as the loosening of "the connection between concept and linguistic expression" (p.149). However, he continues, "there need not be any correlation between the degree of this disturbance and the rest of the association disturbances and the level of what we call intelligence" (*ibid.*).

Both note that the anomalies found in speech can also be found in writing, although this is not necessarily the case – a patient who cannot express themselves in one medium may have no trouble in the other. Indeed it would appear that this was often how both clinicians determined whether the problem was conceptual/thought-based or merely linguistic/expressive. Both also make reference to a patient's behaviour as giving clues to rationality – Krapelin mentions rational behaviour in the presence of confused speech; Bleuler reports physiological signs giving away a mute patient's comprehension, or a patient experiencing blocking being able to continue expressing the thought through gestures.

Indeed on this point, Bleuler draws attention to the often stark distinction between what seems and what is. While Kraepelin does acknowledge that mutism can be the result of voices forbidding the patient to speak, for the most part, monosyllabism, mutism, lack of initiation, hesitating speech, and dull facial expression are evidence of “[t]he cessation of the need to express oneself” (p.55, emphasis omitted). Bleuler's approach is a little more sensitive. Patients speak of “thought overflow” (things escape their mind), “pressure of thoughts”, “collecting of thoughts” (p.29). The observer may conclude the patient is thinking less not more (since not much is forthcoming), while the patients themselves report a compulsion to think. This is typical of Bleuler's regard for patients' experience of their disease, not shared by Kraepelin.

Bleuler notes that our access to hallucinations is problematic: voices forbid the patient from sharing, or patients fear they will be judged crazy by disclosing the presence of voices. Interestingly, Kraepelin does not appear to regard hearing voices as an automatic marker of irrationality: he cites a patient, “quite reasonable and sensible”, who took notes of what his hallucinated voices said – the result was “detached sentences without connection” (p.10) which the patient himself could not explain. However, in some transcriptions of hallucinated speech one is able to find “a certain connection, if only *external*, of the ideas which follow each other” (p.11, emphasis added). There is a striking similarity between reported hallucinated speech, and transcribed schizophrenic speech as reported by Kraepelin (although he does make any explicit connections between the two).

Bleuler is acutely aware of the impact of both the internal and the external environment on many patients. Internally, they may be preoccupied with their thoughts, or have emotional associations to the topic of conversation. Externally, they may be overwhelmed by the immediate or surrounding stimuli, so for example, will name everything they see, rather than respond appropriately to what is being said to them. This compulsive 'naming' has a tactile/motor component to it, namely, 'touching' – a patient's compulsion to feel whatever he or she sees. Bleuler links this phenomenon to the content of auditory hallucinations – in which patients hear a running commentary on their actions – as well as to echolalia and echopraxia, in which the patient imitates or acts out what they see and hear. He explains: "Every idea has a motor element; in the actions he sees performed before his very eyes, in the words he hears spoken, this component is quite obvious in the healthy person" (p.29). The opposite to this 'hyper-integration' also exists; patients may appear completely oblivious to their environments too – which Bleuler termed 'autism', "a very peculiar alteration of the relation between the patient's inner life and the external world. The inner life assumes pathological predominance" (p.63). Autistic thinking obeys its own special laws: patients think in symbols, analogies, fragmentary concepts, make accidental connections. However, they can return to 'normal' logical thinking – whether this is an act of the will is unclear.

To sum up, then, for both Kraepelin and Bleuler, grammar does affect comprehension; schizophrenics tend to disobey the rules of language which can make their speech difficult to understand. For both, linguistic abnormality can exist without underlying thought or associative abnormality. Speech can even seem to take place in the absence of thought or intention (that this is by definition pathological implies a belief that normal utterances are intentional/convey thought). The divide between conceptual abnormality (train of thought) and content abnormality (delusions) is hardly gaping; for Bleuler at least, these influence each other. The relationship between hallucinations, speech abnormality and delusions is not as remote as in modern accounts. Also, that writing is afforded more than a mere mention (Kraepelin even reproduces samples as photographs) is in distinct contrast to current approaches to schizophrenic language.

For Kraepelin, breakdown in the rules of logic, language and discourse, result in meaninglessness: inner connections are non-existent, and only outer connections remain.

For Bleuler, although words may no longer ‘contain’ the usual meaning (a splitting of the bipartite sign, which in Saussurean terms would imply the schizophrenic is in possession of a different *langue*), meaning is largely to be found in the associations *behind* the schizophrenic speech, partly because these associations are peculiar to the patient, and not the ones shared by most due to shared experience. Associations which may have occurred by chance (perhaps due to ‘outer’ similarity) take on meaning when they are ‘retained’ (i.e. reused). For both, unique experience may necessitate the use of neologisms.

Without consideration of the immediate environment, emotional complexes, even regional slang, Bleuler contends one will struggle to make sense of the patients’ utterances. A patient’s own account of experience is valuable, even if they only have insight into this in remission. Neither Bleuler nor Kraepelin were aware of their co-constructive role in making meaning; rather an utterance can be analysed to ‘find’ its meaning.

For both, there is clear evidence of a fairly classical view of language, as consisting of rules for combining words, which themselves have meaning because of the concept to which they are conventionally ‘attached’. These concepts are located in the mind, whereby they are transformed into words (Kraepelin’s inner speech), and then expressed as outer vocal speech. Using modern terminology then, both competence and performance may be affected. However, there is no sense of violence being done to some abstract entity called ‘*the language*’. Incomprehensibility is as much a function of breaking the rules of language and logical association as flouting the norms of utterances ‘fitting’ with their situation.

Although Kraepelin and Bleuler dominate any discussion of the formative years of schizophrenia as a disease-concept, these giants of early psychiatry do not account for the full picture. Kleist was possibly the first to remark upon similarities between SLB and aphasia (pointing to potential organic causes), and he was also one of the early proponents of theory that implicates disorders of the frontal lobe with the disorganisation apparent in schizophrenia. Unfortunately, Kleist’s ideas were not accepted by the mainstream during his lifetime (McKenna, 2007). In addition, Bleuler saw his work as an application of Freud’s theories – it is usually maintained that their work diverged quite considerably in the end, although there is evidence that Bleuler did not consider himself to have disowned

psychoanalytic theories (Zilboorg, 1957). Freud attempted to use his work on the neuroses to formulate a theory of psychosis (Pao, 1973). Linguistically speaking, he maintained that

the problem of schizophrenic speech is an inability to be interested in people and things outside the self so that the qualities of words superseded their socially accepted, symbolic significance and disrupted the relationship between sign and signified which non-psychotic speakers and listeners take for granted. The psychotic speaker then relates to words as things themselves rather than words as signifiers. The properties of words for sound, ambiguity or idiosyncratic meaning rather than the meaning of the word for the occasion become more important in the determination of use. [Sledge *et al.*, 2001:372]

Freud's theory quite explicitly relied on classic semiology and orthodox Saussurean linguistics – schizophrenia, for him, it would seem, is an inability to treat signs as signs: a semiotic disorder. It is likely that mainstream American psychology's gradual acceptance of psychoanalysis in the wake of Freud's lecture tour in 1909 (Von Falkenhausen, 2008) paved the way for a greater affinity to Bleuler's approach. The psychoanalytic influences in American psychiatry's approach to schizophrenic language were still strong in the 1940s,⁵⁰ as evidenced by the work to which we now turn.

4.2 The 1940s

In 1944, JS Kasanin, an American psychiatrist, published an edited collection of papers by leading authors in the field, entitled *Language and Thought in Schizophrenia* (1964a[1944]), which provides a fairly good picture of American psychiatry's position on language and schizophrenia towards the middle of the twentieth century. Presumably no parallel publication appeared in the UK around this time, because, following Kraepelin, language and communication was not considered central to the disease. Kasanin, on the other hand, clearly aligns the volume's work with the Bleulerian tradition, barely mentioning Kraepelin, and labelling Wundt's speculation about the pathophysiology of schizophrenia as somewhat "obscure" (Kasanin, 1964b[1944]:1). He also cites the influences of Freud, Jung and (in particular) Meyer, who according to him, maintained that schizophrenic speech has a

⁵⁰ On Freud's influence on American psychiatry in general, see Myers (1940).

“definite meaning”, but this may be “distorted and incomprehensible to the observer” (p.2). In other words, although pathological, there is a level at which schizophrenic speech ‘makes sense’, or can be interpreted.

In the preface, Nolan DC Lewis clearly outlines his conception of language (and, presumably, he speaks for the collected authors). He notes that although there are competing theories, it is generally agreed that “language is the expression of human thought” (Lewis, 1964[1944]:v), and through language we ‘interchange’ thoughts. Strictly speaking, language consists of “signs of thought” (p.vi) such as words and sentences, although it may be broadened to include other forms of communication, such as gestures and facial expressions. Language is “imposed from without” (*ibid.*) on the individual mind by the culture in which the person grows up, and with it, to an extent their knowledge.

And yet while Lewis’s ideas may at first seem to be a straightforward expression of the telementational and determinacy fallacies, with language a fixed code handed down from generation to generation, his ideas are far from being that black and white. For he also claims that “[l]anguage is a type of social action” (p.vii) and asserts that “[i]f language is but the instrument for the expression of thought, it then comes to be just what the users make it” (p.vi). Furthermore, language is for Lewis a function of its context; “utterance and situation are bound up intimately with each other” (p.vii). And in both normals and schizophrenics, “[w]ords are symbols... used in different patterns and levels of meaning. Their significance must be ascertained by a thorough study of their functional roles” (p.viii). Thus language structure (as it is conceived of today) is of little interest to these clinicians, rather treating language as an encultured action or behaviour is the approach they find meaningful. It does remain, however, the *vehicle* of thought, and speech, the *exchange* of these thoughts. Kasanin confirms this in his concluding chapter: “language represents external manifestations of thought” (1964c[1944]:124).

Lewis characterises SLB as follows: “They often use words and sentences the meaning of which is not familiar to the normal or average person. Many if not most of these words are peculiar to the patient and usually have a special significance” (p.viii). Due to their disturbed associations, schizophrenics’ speech may be unintelligible, but that is not to say that

connections do not exist in their own minds. Thus, meaning is hidden, not immediate to the listener but there for the finding in the patient's mental associations. Here too, are echoes of orthodox semantics – meaning is depicted as being discovered, not constructed or emergent.

The volume focuses overwhelmingly on the psychological realm of schizophrenia. In fact, in his 'Concluding Remarks', Kasanin (1964c[1944]) notes that "irrespective of its origin, [schizophrenia] will always remain... a psychological problem" (p.124). He discusses the papers' approach to schizophrenic thought and language separately ("although by and large one is an aspect of the other" [p.125]). What follows is a summary of the main theories and theorists included in this collected work.

For Goldstein, abstract thinking is necessary for the ego's detachment from the outer world, enabling one to actively engage with the world, but maintain some control and distance. He focused on the concrete nature of schizophrenic language – a seeming inability to abstract or generalise, due to a compulsion to pay attention to everything at once. What schizophrenics say is thus understandable in the context of their immediate, concrete experience of the world. Goldstein proposed both a biological and a psychological cause for this behaviour.

Similarly, Kasanin himself drew attention to the erasure of the schizophrenic's ego-world, or figure-background boundary, and the blending of imagination with reality. He explains schizophrenic language's literalness in psychoanalytic terms – it stems from fear ("to learn, generalize, and make definite conclusions" [p.131]), and "a defense against his own ambivalent tendencies" (*ibid.*). Literal language is construed as the default option of meaning, in keeping with the orthodox understanding of figurative language, where metaphorical meaning is a departure, requiring effort.

Benjamin also commented on the schizophrenic's tendency towards very literal thinking, and his "refus[al] to understand symbols, although he may use them a great deal in his own speech" (p.126). Von Domarus's contribution (in what later became known as the Von

Domarus Principle) was that schizophrenics' thinking follows the distortion of paralogic, whereby subjects' identity is based upon the identity of their predicates.⁵¹

There runs through the papers a sense that schizophrenic language is, at least in part, deliberate, and not just the brain's malfunctioning language faculty. As Kasanin puts it, "[t]he schizophrenic... has no intention of changing his highly individual method of communication and seems to enjoy the fact that you do not understand him" (p.129). Sullivan interpreted the schizophrenic's highly individual language as a source of security, protection from the world obtained by cutting off communication, allowing language to take on a magical dimension. Kasanin summarises Sullivan's theory of 'consensual validation': "The process of communication depends upon a *feeling* that when you say something the person who listens to you feels and thinks the same way you do and that you understand each other" (p.128, emphasis added). Significantly, here, as with Toolan's (1996) and Linell's (2005) conception of 'other-orientation', communication does not depend on shared knowledge, but shared expectation. In schizophrenia, consensual validation is absent.

Somewhat confusingly, Kasanin characterises Cameron's opinion of the schizophrenic's language as "neither irrelevant nor incoherent" and yet "his speech lacks unity and synthesis" (p.129). Clearly here, coherence of language refers more to intelligibility than to the actual 'overall structure' to which Covington *et al.* (2005) apply the term. For Cameron, the speech makes sense within the context of the patient's experience.

Angyal's idea that disorder starts with disintegration at the level of the whole, and results in the breakdown of component functions (rather than the other way round) leads Kasanin to muse whether "the disturbances of language and thought are the effect of schizophrenia or the cause of it" (p.128). At any rate, he is of the opinion that "[t]he disturbances of language are essentially evidences of the disturbance in the function of communication which is the cardinal problem in schizophrenia" (*ibid.*). It would appear then, that for Kasanin, communicational competence precedes linguistic competence.

⁵¹ Instead of the usual 'All men are mortal. Socrates is a man. Therefore Socrates is mortal.' line of logic, the schizophrenic could maintain that because 'All men are mortal' and 'Socrates is mortal' it follows that 'All men are Socrates'.

Kasanin's concluding paragraph calls for an investigation into conceptual thinking in normals, particularly the cultural influence on this, as well as more research comparing schizophrenia with organic psychoses. His use of the term "formal thought disorder" (p.133), and his conclusion that the collected papers have described quite well this phenomenon indicate just how much this fuzzy term has changed over the years. Except for Cameron's mention of 'lack of unity and synthesis' in speech, and the various indications that the schizophrenic speaker fails to take the listener into consideration, there is very little in common with the modern definition of FTD. In closing, Kasanin sums up all the approaches in the book: "We all agree that the most important cause of disturbances in the thought and language of schizophrenia is the disarticulation of the patient from his social context" (*ibid.*).

4.3 The 1960s

Just two decades later, much had changed in the fields of both psychiatry and linguistics. Generativism had trumped behaviourism in linguistics, and antipsychotic medication had begun to show positive results in psychiatry. The former is explicitly Vetter's motivation for producing his collation of already published papers (Vetter, 1968a); noting that the last substantial collected work on the matter was that by Kasanin (1964a[1944]), he asserts that a new collection of articles on the topic of language and psychopathology is warranted by the massive progress that had been made in the understanding of language, by psychologists, but particularly by linguists. In fact, for Vetter linguists offer "a dimension of linguistic sophistication that was notably lacking in earlier studies" (1968b:viii). He attributes the absence of dialogue between the two disciplines partly to psychologists' lack of knowledge of what was available, but largely to linguistics' somewhat autistic behaviour in the first half of the twentieth century:

With their gaze turned inward upon the continuing upheaval produced in structural linguistics by the revolutionary innovations of generative grammar, linguists have been selectively inattentive to the problems of psychopathological language. [p.viii]

This sense of hope in the promise of generative linguistics is palpable in Pavy's review (1968) of then-recent studies of 'verbal behaviour in schizophrenia', published in the same year. Pavy's main argument is that work in the field had hitherto focused solely on behavioural aspects of speech production, to the neglect of linguistic structure, summarising existing studies under the topics of word associations; ambiguity and metaphor; information content and textual constraints; and the role of contextual constraints in speech perception.

Vetter, like many others in his volume, finds 'schizophrenic language' problematic – "a misleading term" which has the effect of blurring "three interlocking areas of investigation", namely "language behavior, pathologies of thought, and communication processes" (p.viii). However, he acknowledges the difficulty in separating these in practice, and on this he quotes Maher (1966):

Investigations of thought processes have leaned heavily on the analysis of verbal statements made by the patients, and it is frequently a matter of the researcher's choice whether or not he regards his work as bearing upon thought rather than language. [in Vetter, 1968b:viii]

Maher's suggested solution is to distinguish between studies that are primarily based on verbal statements and those that use categorisation/conceptualisation as their main source of data, although this too, as Vetter notes, is not foolproof – but at least a step in the right direction.

Vetter (1968c) introduces his collection by summing up the dominant approach at his time of writing, covering Goldstein, Kasanin, and Von Domarus, but also including a few later theories. Arieti proposed a dynamic approach whereby schizophrenic language is seen as primarily motivated by "the removal of anxiety" (p.7); since it is functional, and not organic, it is impermanent (thus degeneration is not inevitable). The features of this language are the impairment of the ability to abstract, symbolize and socialize or integrate into society (adapted from Vetter's list, p.8). Arieti seems to hint at a bidirectional influence between the loss of socialisation and the breakdown of language: "When the schizophrenic loses the use of social symbols he also desocializes himself – thereby living in isolation. As the

schizophrenic becomes more desocialized, the understanding of his language becomes more difficult, reaching a peak in the word salad” (p.10). Cameron’s position is updated as the “hypothesis of overinclusion” (p.13), in which a lack of structure allows the immediate environment to determine the form and content of schizophrenic thinking. Despite an ability to define words, the schizophrenic fails “to integrate [these] words into meaningful communications” (Cameron 1944/1963, in Vetter, 1968c:14).

Vetter balances his summary of these approaches with criticism, starting with Brown’s insight that the notions of ‘abstract’ and ‘concrete’ are terms of convenience that instead of describing some inherent quality, really designate membership of one of two categories: “the healthy, civilized adult” human (to which the researcher invariably belongs) and everybody else (children, primitives, the diseased, animals). Thus:

Each category lacks one attribute of the category to which the researcher himself belongs. There is a beautiful simplicity in the notion that all departures from ourselves are basically the same kind of departure. [...] The result is that *concrete* and *abstract* name all sorts of behaviors having no clear common properties.

[Brown, 1950, in Vetter, 1968c:11]

Brown also calls into question the diagnostic reliability of tests that demonstrate statistically significant differences between normals and schizophrenics on abstract/concrete measures, but also considerable overlap.

Maher criticises Arieti’s conflation of paralogic with paleologic, firstly because even though Von Domarus considered paralogic a feature of the thinking of “primitive people or higher animals” (p.10), he never intended the concept to have regressive connotations, and secondly, because it easier to explain the concept in terms of behaviourism. Paralogicality is really an example of “extended stimulus generalization” (p.12) to a limited stimulus that would not likely elicit a response in a normal person (this is what makes it pathological), and not necessarily indicative of the train of logic at all.

Moving away from theories of schizophrenic thinking, Vetter indicates something of a consensus in the relationship between socialisation and ability to use language: impairment in one leads to impairment in the other, and he summarises this interpersonal approach, most notably Bateson's, for whom it begins in childhood, through involvement in double-bind type communications from an early age. This double-bind hypothesis contends that a child is caught up in a communicative situation (usually with the mother) in which conflicting messages are transmitted, i.e. what she says, and how she behaves, are incongruent with each other. Whichever message the child responds appropriately to, the overtly verbal message of love, or the covert behavioural message of hostility, the child will be punished. The only way out would be for the child to discuss his double bind situation, but this would be regarded as criticism, and he would be punished accordingly. Thus "[t]he child is not allowed to talk about the situation in order to resolve it" (p.16). He or she grows up an incompetent communicator and metacommunicator, "his [or her] ability to communicate with others about their communication with him [or her] is greatly impaired" (*ibid.*). In fact, according to Bateson and Ruesch, most psychopathology is a consequence/manifestation of disturbed communication.

Concerning the shift that the concept of language underwent in psychology in the first half of the century, Vetter's opinion is that little except terminology actually changed. Behaviourism's "verbal behaviour" didn't differ substantially from language as "a vehicle for expression of ideas" (p.23, original emphasis omitted). Considering "linguistic phenomena... [to be] symptoms of underlying pathological conditions" (*ibid.*, original emphasis omitted) remains the outcome. This is an attractive approach for a number of reasons: the data are easily observed and gathered, and the diagnostic and predictive value is clear. Despite the amount of data that has been generated, there is still no clear demonstration of how the form and content of what schizophrenics say is related to the underlying pathology. His conclusion is that treating linguistic phenomena as merely symptom or verbal response will not be fruitful, and an interdisciplinary approach is called for.

Vetter's summary, and the papers he chose to reprint in his collection aptly illustrate the threshold on which theories of SLB stood at the end of the 1960s. There is a call to move away from evaluating schizophrenic language in terms of communicative function, and

instead its expressive (Lorenz, 1968) or 'poetic' function (Forrest, 1968). Richman (1968) explores 'symbolic distortion', Chapman (1968) and Eliseo (1968) investigate schizophrenics' difficulty with figurative language, and a number of papers (including Mednick, 1968, Staats, 1968, and Salzinger, *et al.*, 1968) use learning theory (derived from behaviourism). Notably, two papers investigate multilingual patients, one in terms of gibberish (Robertson & Shamsie, 1968) and the other in terms of hallucinated voices (Schaechter, 1968).

Pavy is not so generous (his review includes some of the work featured in Vetter's edition of collected papers). In dismissing (following Chomsky) the "implicit finite-state model" of language employed by Salzinger *et al.* (1968), his disdain for behaviorism is quite apparent, as is his sense that its proponents engage in a futile task when trying to account for verbal behavior: "even a verbal behaviorist needs a model if he is going to joust with the windmill of language" (p.173). This finite-state model paints a picture of "an automaton designed to produce sentences with only the knowledge of (or transitional probabilities based on) words previously uttered [whose utterances] would probably be considered pathological" (*ibid.*). Pavy effectively styles the behaviourist's speaker as a 'communicational cripple' in much the same way as Harris does Chomsky's ideal speaker-hearer.

'Contemporary linguistics', on the other hand, views language as "an unbounded system based on a highly specific and limited set of rules... Innovation is the essence of actual language" (p.171). This focus on innovation, novelty, creativity might seem well in accordance with integrationist linguistics. However from the following passage his deviation from integrationist sympathies becomes clear:

Such a theory [of speech in schizophrenia] must begin with a theory of general competence of the speaker. Then by the inclusion of other factors involved in speech production in schizophrenia (attention, short-term memory, anxiety, motivation) one can move to hypotheses about the interaction of behavioral factors with the structure of language. [p.174]

The equation of the normal speaker with the ideal speaker is all but total. What it also implies is that competence is not lost in schizophrenia; it is performance alone that is

affected. Pavy sees the division of labour as follows: while the linguist's task is to produce a model of competence, the psychologist is responsible for detailing a performance model, which will be dependent on the linguist's offering.

Pavy does caution, however, after championing Chomsky's significance, that he does not regard the "introduction of linguistic theory into the study of speech in schizophrenia will be a panacea for problems of the field" (p.174). In fact, he makes the following rather insightful contribution (an easy-to-overlook half paragraph, considering the main thrust of his argument):

If subsequent investigations of the sort suggested here, based on the best insights the theory of normal language can offer, continue to fail to define the disorder, it is possible that attention should be turned to the interactional aspects of the phenomenon. It is suggested that it might be as useful to attempt to account for the diagnostician's perception and categorization of speech as it is to study the patient's production. [p.176]

Ironically then, given the summaries above of the two men's positions, Vetter is perhaps ultimately more optimistic about the involvement of linguistic theory, expressing a hope that the "conceptual link[s]" (1968b:ix) between what he has designated the 'three interlocking areas' of schizophrenic language (and therefore three fields of psychology, communications, and linguistics) will one day be discovered, and that linguists have much to offer in this regard.

As mentioned in Chapter 1, the 1960s also saw the rise of a different sort of revolution, the anti-psychiatry movement. While this was not chiefly concerned with theories of SLB, their views do represent an extreme counter-proposal, that was quickly quashed, to the biomedical bias beginning to gain popularity in psychiatry and linguistics. The Scottish psychiatrist RD Laing in particular had risen to prominence through a series of publications, starting with *The Divided Self* (1975[1960]). Although Laing did not subscribe to the 'anti-psychiatry' label he

In 1974, the likes of Pavy and Vetter's call for linguistic involvement was heeded. Elaine Chaika had no doubts about linguistics' significance, nay, indispensability, when it came to making sense of psychotic language behaviour. In her later book (Chaika, 1990), fleshing out and refining her earlier theories, she quotes Caplan (1980) on the value of linguistic analysis:

it utilizes psycholinguistic and linguistic constructs derived from scientific studies of language structure and processing rather than intuitive taxonomies and analyses. As a result it achieves... specificity in the description of the linguistic and psychological deficits. [p.3]

Furthermore, her work is based on the assertion that "[s]tructurally deviant speech is a symptom in and of itself and, as such, must be analyzed in its own right. This necessarily entails examining speech without reference to the thought behind it" (p.31). Linguists would not be content to just 'help out'; they aimed to stake out territory for themselves.

Her seminal paper was prompted in part by a statement made by Roger Brown (1973), a psychologist reporting on a brief period spent observing patients in a mental institution, that although he "encountered plenty of schizophrenic thought" he was compelled "to conclude that there is no such thing as schizophrenic speech" (p.397) – Chaika begs to differ. As such, she "attempt[s] to describe the data in purely linguistic terms, treating language as a competence in itself" (1974:258–259), and is concerned with "the nature of the deviance in linguistic code, and the regularity of that deviance over a particular population of patients" (p.257). Her data is derived from a single patient, during a floridly psychotic episode.

Explicitly relying on generative linguists Chomsky & Halle (1968) and their notion of "words having deep structures upon which phonological rules operate" (1973:263), Chaika explains gibberish, for example, as "a disruption in the ability to match sound strings to actual words" (*ibid.*) and is perhaps "an intermittent form of aphasia" (p.265). They are not likely neologisms, because no explanation of their meaning is offered (and if they are neologisms, then this failure to notify in itself is deviant), nor slips of the tongue, because patients do not appear to be aware of the deviance.

Based on the “aberrations [detected] in [Patient] X’s code” (p.260), Chaika concludes with what she considers to be the six defining features of deviant schizophrenic speech (adapted from p.275):

- 1) sporadic disruption in the ability to match semantic features with sound strings comprising actual lexical items in the language
- 2) preoccupation with too many of the semantic features of a word in discourse
- 3) inappropriate noting of phonological features of words in discourse
- 4) production of sentences according to phonological and semantic features of previously uttered words, rather than according to a topic
- 5) disruption in the ability to apply rules of syntax and discourse
- 6) failure to self-monitor, e.g. not noting errors when they occur

Thus, SLB is a series of serious speech errors, a performance failure describable in terms of its deviance from the rules of syntax and discourse, and evidence perhaps of temporary lack of access to deep structures of language in the brain.

Chaika’s paper ignited fierce debate about whether schizophrenic speech was indeed indicative of an underlying FTD or was a speech disorder in itself, and prompted renewed comparisons to aphasia (a debate that lives on into the twenty-first century, e.g. Oh *et al.*, 2002). Notably, Chaika never denied that a thought disorder existed, merely that deviant speech was not sufficient nor necessary to prove its existence, nor was its existence necessary to explain speech disorder. Fromkin (1975) promptly launched a critique of Chaika’s work, arguing that five out of her six featured ‘errors’ are found in normal speech, the only exception being “the disruption of the sequencing of ideas in discourse which can be attributed to nonlinguistic factors” (p.498). In other words, there was nothing particularly schizophrenic about what she had found – healthy people’s speech also displays ‘code aberrations’.

Lecours & Vanier-Clement (1976) responded to both Chaika and Fromkin with an exhaustive comparison between normals, jargon aphasics⁵⁶ and schizophrenics, concluding that except for error 2, there is a large degree of overlap (schizophasia is mostly characterised by errors 2, 3 and 4, while jargon aphasia mostly displays errors 1, 4 and 6), while error 6 they feel was an erroneous attribution to schizophasia altogether. They agree with Fromkin that most of the errors are also made by normals, but are much less common or characteristic.⁵⁷ However, the authors make it clear that while their conclusion is about ways in which one could identify schizophasic or jargonaphasic speech from a transcript, these are not necessarily purely 'linguistic' judgements, and indeed in practice, inferences about patients' intentions and behaviour also play a role.

Sherry Rochester (1978) investigated whether schizophrenic speech could be characterised as an 'information-processing disorder', whereby short-term memory deficits result in failures to account for the listener's needs. The next year saw the publication of two groundbreaking studies: first, Andreason's (1979) attempt to clarify FTD by classifying it in terms of the 18 types of what she called disorders of thought, language and communication – developed into a rating scale for distinguishing between TD and NTD schizophrenics still in use today. Second, Rochester (a psychologist) teamed up with Jim Martin (a linguist) to produce a systematic and detailed investigation into schizophrenic speakers' discourse.

Although not the first to note the tautological reasoning involved in the concept of FTD, Rochester & Martin (1979) produced a particularly damning critique of the circularity of equating FTD with speech disorder: "the assessment of 'thought disorder' is based on an inference from talk not thought; and... 'talk failures' are inferences based on the *listener's* experience of confusion" (p.3). Nevertheless, they remark that the inferential tradition, which "relies on the profound sensitivity of native members of a culture" (*ibid.*), although troublesome, displays a degree of sensitivity yet to be replicated or captured by linguists and psycholinguists.

⁵⁶ Patients who speak fluently, as if what they say is understandable to themselves and others, but whose speech is filled with inappropriate words, gibberish words, or even sounds 'standing in' for normal words.

⁵⁷ Although they feel she takes it too far by asserting errors 2–4 are 'normal' by invoking Lewis Carroll's writings as evidence.

The authors' aim was to "develop[...] an account of how speakers form coherent 'texts' – stretches of speech which form a [*sic*] more or less unified wholes for the listener" (p.50). By applying Halliday & Hasan's (1976) theory of "cohesion devices" (*ibid.*), detailing speakers' strategies for linking clauses together within their discourse, as a tool for analysis of schizophrenic speakers' discourse, Rochester & Martin discovered that it was not the presence or absence of these cohesion devices that affected textual cohesion, but rather the *way* they were used. Crucially, their use of cohesive ties as an analytic tool served to distinguish on some measures between schizophrenics (TD and NTD) and normals, and on other measures between TD schizophrenics and the other two groups.

Comparing the three groups, they found that "[i]n narratives, schizophrenic speakers relied less on cohesive tying than normal speakers" (p.169) – in the case of NTDs this is likely due to the fact that they produced less speech compared to others groups. Secondly, while TD speakers displayed high lexical cohesion in interviews, NTD speakers hardly used lexical ties at all (normal speakers fall in between). Thirdly, TD speakers appeared to presume the hearer knows more than they do, making indirect, obscure references, while NTD speakers presumed too little. Lastly, TD speakers made numerous exophoric references, and both TD and NTD tended to rely on nonverbal resources (for example, pointing to rather than naming what one is referring to). Covington *et al.* (2005) remark on these differences that it almost seems that the NTD speaker is "keeping things simple on purpose" (p.92).

One of Rochester & Martin's conclusions seems to be routinely overlooked by reviewers: that linguistic theory wholly constrains one's outlook.⁵⁸

The conclusion that the problem in thought disorder or 'schizophasia' exists at the level of thought, not language, involves an assumption about the scope of a language system. The conclusion implies a system of language that is unable to account for language use beyond the clause or sentence. This is the case for standard transformational theory. Thus, for Fromkin and others who follow a version of this theory, problems beyond the level of the clause must be beyond the level of language. From within the framework of such a theory, there is no

⁵⁸ An idea reiterated by Martin (1982) in response to Schwartz's (1982) overview of the topic (see below).

way to dispute the assertion that the problems encountered by TD speakers are not based in a language system. However, if one embraces a wider theoretical system that postulates linguistic rules at the level of discourse – rules about the linkages among clauses and among sentences – then the problems encountered by TD speakers can be conceptualized as language problems. [p.188]

Their ultimate conclusion was that ‘thought disorder’ is a misleading and unhelpful construct; research instead should focus on what makes their speech difficult to understand (Bentall, 2003). Rochester & Martin had successfully brought the data back into the ambit of linguistics.

FTD continued to come under fire in a series of papers in the early 1980s. Chaika (1982) made a renewed argument for the case of speech disorder over FTD, again invoking the autonomy of language as “a self-contained system with no inherent reference to thought or the outside world” (p.587), and thus Occam’s razor. Andreason (1982), for different reasons, argued for a revision of the term ‘thought disorder’, which she still found too imprecise.⁵⁹ A third influential paper published in the same year, Steven Schwartz’s ‘Is There a Schizophrenic Language?’ (1982) provided another wide-ranging review of the literature, and drew response from researchers representing a similarly broad range of disciplines. Schwartz maintained that there is schizophrenic speech and there is possibly schizophrenic thought, but it makes no sense to speak of schizophrenic language, because schizophrenics’ language is intact; their ‘bizarre’ communication is all down to performance, not competence. Despite dissent in the ‘Open Peer Commentary’ following the article, this competence/performance distinction has largely been upheld in mainstream approaches.

Lanin-Kettering & Harrow (1985) criticised Chaika’s (1982) work, arguing for a focus on the thought behind the words, but as Chaika & Lambe’s rebuttal (1985) of their critique

⁵⁹ She evaluated the alternatives: ‘speech’ is not broad enough; ‘language’ is not directly observable, but is inferred from speech; ‘communication’, “the rule-governed sharing of information between people, primarily through the use of language” (p.296), is perhaps too broad; ‘thought’ is not scientific or medical enough, but rather a “philosophical term” (*ibid.*); and ‘cognition’ is more scientific, but again too broad. Her two solutions were either to combine some of these, for example, thought, language and communication (TLC) disorder, or to come up with new terms entirely, for example, *dysphasia* (covering abnormal speech) and *dyslogia* (covering abnormal thought processes).

correctly points out, they misrepresented her argument, and ultimately brought nothing new to the debate. Harrod (1986) introduced fresh argument on the back of this exchange, asserting that schizophrenia is best characterised as a semiotic disorder. It is a disorder of language-in-use, of “saying something about something to someone” (p.12), which is primary to the oft-described disorders of discourse or syntactic structure. Although provocative, his argument reliant on Peirce’s classic semiotics, is skeletal at best. Ultimately, though, he misinterprets both Chaika & Lambe and Lanin-Kettering & Harrow as characterising schizophrenia *itself* as either a speech or a thought disorder respectively (as both sets of authors point out in their rebuttals [Chaika & Lambe, 1986; Harrow, Prather & Lanin-Kettering, 1986]). Despite the lengthy debate surrounding use of the term ‘thought disorder’, it enjoys obstinate longevity, and remains in use today. Not surprisingly, McKenna’s (2007) appraisal of this decade’s worth of exchanges is that “the arguments revolved around the fine points of linguistic theory and none of them decided the case either way” (p.241).

By the turn of the decade, Chaika had refined her ideas quite considerably. Still adhering to the belief that disordered speech is exactly that (independent of a potential underlying FTD), her admiration for Chomsky had waned considerably in the intervening years since writing her seminal paper. In fact, her monograph *Understanding Psychotic Speech* (1990) was subtitled ‘Beyond Freud and Chomsky’. She positions herself as a pragmatist, and argues for the deeply entwined nature of semantics and syntax, and the undeniable influence of context on meaning. Ultimately, for her disorganised speech is the result of failure to control speech production.

The 1980s featured numerous studies probing the linguistic features of psychotic speech, often comparing it to the speech of aphasics. The general consensus is that there is a clear difference between aphasia and schizophrenic speech (schizophrenics’ speech, for one, displays a control and awareness of language that far outstrips aphasics’ abilities) (Covington, *et al.*, 2005). This surely only served to reinforce the tendency to treat it as evidence of a thought disorder, which remains popular. While this decade also saw the publication of a rather dense collection of papers which argued for an interdisciplinary approach to schizophrenia (Wodak & Van de Craen, 1987), with the technological progress in brain

imaging allowing for investigation of real-time brain function, and non-invasive structural exploration, the medicalisation of mental life had already gained significant momentum, culminating in what would come to be termed the 'decade of the brain', the 1990s (Estroff, 2004:282).⁶⁰ Although it had long been known (via autopsy) that schizophrenics' brains tend to display abnormal lateralisation (the source of the emergence of evolutionary theories of schizophrenia beginning in the late 1970s) and ventricle volume, new technology provided unparalleled access to an organ that had been shrouded in mystery for so long. The discovery of abnormal brain structure and function is presented as the ultimate rebuttal to all the purely psychological, interpersonal, social theories of schizophrenic language, to all the skeptics that questioned the very disease's existence. This is not to say everything is known about the schizophrenic's brain and how it relates to symptoms, but the sense that researchers believe it is only a matter of time is almost palpable. With regards to SLB then, psycholinguists' contributions are welcome insofar as they can make actual links between their theories and abnormal brain structure and/or function.

4.5 Conclusion

This whistle-stop tour through a century's worth of research on SLB has served to demonstrate the changing concept of language within research in this field. In the early days, there were two distinct perspectives – the Kraepelinian biomedical approach, in which language is understood as the output of a damaged brain (the location and source of damage as yet unknown), rendering utterances relatively meaningless; and the more integrated Bleulerian approach, in which the disintegration of language is seen as intimately tied up in the disorganisation and disintegration of emotion, behaviour, association, volition, and the individual's relationship to his or her world, rendering the schizophrenic's utterances as potentially meaningful.

Here already are clear indications of the language myth's influence; language is considered the expression of thought, words have definite meaning, and transgressing the code results in speech that is confusing for the listener. However, their work, the originals published just

⁶⁰ This is evident in the schizophrenic symptoms listed in the latest revision of the Diagnostic and Statistical Manual in 1994 (DSM-IV): Jenkins (2004) reports that "characteristic symptoms involving multiple psychological processes' such as alteration in 'sense of self'" were omitted, while "associated laboratory findings' and 'associated physical examination findings and general medical conditions'" made their debut.

before Ferdinand de Saussure's *Cours* (1983[1916]), also bear evidence of ideas that contradict the psychologicistic view of language that has come to dominate linguistics. For example, writing is not seen as speech's poor stepchild, and the normality of language is judged according to its fit with context, while adherence to abstract rules takes a backseat, as does an appeal to an internalised grammar.

The Bleulerian tradition largely dominated research on language and schizophrenia until advances in both medical science and linguistics provided the Kraepelinian approach with a reason to be interested in SLB. As the neo-Kraepelinians came to dominate the field, *what* schizophrenics said faded into insignificance compared to *how* they said it; the linguistic structure of a decontextualised transcribed utterance could provide clues as to the organisation and function of the schizophrenic brain. Research also became consumed in a debate about the boundaries of language: narrowing it too much would make linguistics irrelevant to deviant speech; broadening it excessively would threaten linguistics' claim to scientific status. While linguists in the field may have sought to prove their indispensability, by and large psychiatry has co-opted linguistics into its project to medicalise experience, reducing human meaning-making to the measurable, analysable trace it leaves behind.

but rather, that linguistics has given psychiatry the ammunition it needed to treat the schizophrenic subject as purely a medical problem. All the subtleties of meaning making can be reduced to brain function versus malfunction when language is cut off from its experiential base.

Implicit in drawing up the 'mainstream' view is the fact that there are schools of thought that do not subscribe to these ideas. As hinted at earlier, there is indeed a growing body of thinkers, some of whom, trained in the mainstream approach, voice concern over its limitations and flaws, while others, applying their knowledge from their home discipline, find the biomedical approach to both normal and schizophrenic experience problematic. By extension then, they take issue with the mainstream approach to SLB. However, these either rely on a classical conception of language which is counterproductive in terms of the other claims they are making, or they do not explicitly espouse a theory of language; in both cases, they stand to benefit from the integrational linguistic approach to bolster their position.

5.1 Evolution

Even in the 'scientific' realm of human evolution, theories about language have shaped the course of research into the potential origins of psychosis. Crow (1997, 2000) locates language breakdown as at the root of communication breakdown, as well as other first-rank symptoms of schizophrenia. However, his ideas about how language operates in the brain are wholly constrained by an orthodox account of what languages are: systems of a finite number of signs, with the rules to combine them in an infinite number of ways, both of which must be realised in the brain somehow. Despite this implicit foundation, Crow never speaks about languages, as such; in fact, his theory assumes the monolingual individual as the norm (a general trend in linguistics – see Love, 2009:30).

Crow's reliance on an orthodox account of language implies all that goes with it – in particular, that language is a distinct, humans-only capacity, an astonishingly powerful ability made possible by brain organisation, that is defined by its fundamental difference to any system of animal communication. However, an alternative hypothesis has recently emerged –

Jonathan Burns's (2007) 'social brain' hypothesis⁶¹ is one that not only does not need orthodox theories of language to explain itself, but is largely compatible with theories of language that reject the orthodox account.

Burns does not reject Crow's theories wholeheartedly – on the contrary, "it is in the detail and emphasis that [they] differ" (p.181). He agrees that "madness constitutes a costly price paid by our species for our extraordinary cognitive superiority" (*ibid.*), but it is what that cognitive superiority entails that draws the battle lines. Or as Burns puts it, the "differences boil down to a basic philosophical divergence on the issue of what specific quality defines us as human" (*ibid.*). For Crow it is language (and a very circumscribed idea of it at that); for Burns it is a "capacity for complex social and interpersonal relationship" (*ibid.*) – brought about through evolved brain reorganisation – that defines humanness. He explains:

In this view, all of the abilities routinely cited as uniquely human are, in fact, secondary to the fundamental human capacity for complex social cognition. Thus what makes language unique to our species is the 'elevation' of generic animal communication by a highly social human mind. (In other words, communication + social cognition = language.) Likewise I would argue that individual self-consciousness is only possible in the context of existing interpersonal consciousness. [pp.181–182]

The parallels with Linell's (2007) 'dialogical brain' and integrational linguistics' idea that "[l]anguages presuppose communication" (Harris, 1998:5) are clear. Burns, as a psychiatrist, provides detailed evidence in terms of brain function of both humans and higher apes to motivate his claim that humans have evolved a 'social brain'. From the integrational linguistic perspective, Crow, blinkered by the orthodox mantra that languages are what makes communication possible, has focused too closely on the second-order construct of 'language' itself, and has ignored that which makes it possible in the first place. As shall become clear in this chapter, Burns's approach to the evolution of psychosis has broader implications for a number of features of SLB.

⁶¹ Burns is not the first to put forward a 'social brain' hypothesis, but he does directly position his theory as an alternative to Crow's.

That said, Burns does rely heavily on the concept of ‘theory of mind’, or rather existential TOM,⁶² which ultimately, cannot be supported by integrationists. For while at first the idea of using other minds may seem to dovetail perfectly with integrational linguistics and dialogism’s arguments, it is, like Clark’s version of distributed cognition, still rooted in representationalism and the classical mind. Cowley (2004) has no problem with ‘theory of mind’ used as a metaphorical device, but when it is invoked to posit some actual adaptive module in the brain, that allows the simulation or representation of other minds, in order to ‘see’ the intentional states of others, one is dealing with what he calls a “magic bullet” explanation (p.280). Using the example of prelinguistic infant communication, he finds no evidence, nor any reason to believe that representations of minds and intentions are what bring about the complex social interaction, epitomised by talking, of which humans are capable:

[C]hildren...act...as if using output from a socio-cognitive adaptation. From the derived point of view, the model provides a reasonable way of conceptualizing how they act. To see it as an explanation, however, is to fall into what Ryle (1949) calls the ‘category mistake’ of thinking that babies access inner intentions, beliefs, and wants. [p.293] [...] *Adult belief* in intentionality ensures perspective taking develops by the middle of the second year. By the age of four, similar mechanisms lead children to belief in selves and minds. [p.294, emphasis added]

No internal representation required.

5.2 The biomedical approach

While it would be patently absurd to claim that orthodox linguistics is single-handedly responsible for the biomedical approach to schizophrenic language, there is no doubt that it has significantly contributed towards this perspective’s support. The treatment of decontextualised utterances’ structural properties as symptomatic of brain disorder, is an approach that one critic says

⁶² See discussion on page 135 above.

bypass[es] the possibility that what [the clinician] takes as ‘symptoms’ to be related back to allegedly determinant antecedents, are aspects of those people’s communicative relationship and have a sense apart from their being produced by physical organs – i.e., an interpersonal meaning or significance.

[Coulter in Frow, 2001:278]

The result of all this is that “the ill patient need not be ‘heard’ beyond the stage of diagnosis” (Frow, 2001:278). Furthermore, from the highly decontextualised approach, suggestions like Covington *et al.*’s (2005) that ultimately a machine could analyse the structural elements of someone’s transcribed speech to achieve systematic and unbiased diagnosis, are not that far off. The depersonalisation of the schizophrenic condition would then be complete – even the ‘stage of diagnosis’ would not involve ‘hearing’ the patient.

Taken to its logical conclusion, the symptom approach to utterances leads to claims such as we saw in Chapter 3, that certain neuroleptic medications effect improvement in particular structural aspects of schizophrenic speech. As Burns (2007) points out, neuroleptic medication is often administered based on its apparent results (“evidence-based practice” [p.8]), not on a deeper understanding of how it works. This leads to “psychiatric services that rely exclusively on neuroleptic medication, and which make little or no effort to respond to patients’ psychological needs” (Bentall, 2003:499). It is this – the reliance on “physical treatments at the expense of treating people with warmth and humanity” (p.498) that prompts the likes of Bentall to champion the ‘post-psychiatry’ movement, which is in direct opposition to the neo-Kraepelinian approach.

Post-psychiatry does not seek to deny the biological reality of schizophrenia, but merely that this will never provide the full picture, because the biological is intimately bound up in the psychosocial and environmental aspects of being human in the world. It rejects the outright dismissal, based on the potential for victim-blaming, of social or environmental accounts of schizophrenia; the fact that we are by our very nature influenced by our environment does not amount to accusing a schizophrenic’s family of deliberately damaging their loved one, or insisting that the patient’s illness is intentional or their own fault. Ultimately, not only is one *not* forced to choose between biological and social/environmental accounts of schizophrenia

(and thus SLB), to make such a choice denies the reality of the phenomenon under investigation (Bentall, 2003). Furthermore, it rejects “the epistemological separation of inner mind from outer world”, and the mind “regarded...as a ‘thing’” (Thomas, Bracken & Leudar, 2004:14).

The post-psychiatry approach, then, is closely aligned with the integrational approach that envisions communication as governed by biomechanical, macrosocial and circumstantial factors (Harris, 1998) – an approach that will never be content with a merely biological account of schizophrenic language, nor will it exclude such an account in favour of the interpersonal. Rather, as the name suggests, it seeks to integrate them. The move in cognitive science towards embodiment and embedding of cognition (e.g. Clark, 1997; Lakoff & Johnson, 1999) described in Chapter 2 provides clues as to how this might be possible.

5.3 The deficit model

The deficit model pervades research on schizophrenia, and consequently research on SLB largely amounts to a description of what is missing (compared to normal utterances, or discourse, or syntax, which in turn is haunted by the figure of the ideal-speaker-hearer as the degree zero against which actual language behaviour is compared). However, as Rochester & Martin (1979) point out, “one cannot hope to provide an adequate account of behavior simply from an account of what is ‘deviant’ about that behavior” (p.49).⁶³ Lorenz (1968) makes a similar point about the description of schizophrenic language and thought in terms of ‘literal’ and ‘concrete’. As Taylor (1997) observes with relation to discontinuity and speech errors, she remarks that the ‘deviance’-focused approach renders what *is* there invisible.

Burns, too, draws attention to the problematic approach of characterising all symptoms as deficits or deficiencies, which ultimately “reinforce[s] the age-old notion that psychosis is a degenerate condition characterized by ‘a paucity of psychological activity or even a dimming of subjective life, perhaps especially of higher forms of consciousness or mental life’ (Sass & Parnass 2001 [cited])” (Burns, 2007:150). It presumes diminished experience – precisely the

⁶³ This is echoed by Jenkins’s (2004) contention that there is a need to focus on “not only the extraordinary, but also...the everyday dimensions of schizophrenic experience” (p.31), and maintains that “in certain ways” schizophrenics “are just like everyone else, only more so” (p.30).

approach taken by Kraepelin, in contrast to Bleuler's refusal to take apparent absence of function at face value.

Those working in the field of aphasia studies have also criticised the simplistic deficit approach to language behaviour. Wilkinson, Beeke & Maxim (2003) note that whether linguistic forms or pragmatic/communicative/social difficulties are focused on, aphasic linguistic behaviour is usually described as 'symptoms' of brain damage, i.e. what you are observing is a direct result of damage to a certain part of the brain. Whether this is the case is up for debate. Goldstein, in the 1940s, was already arguing that what we label as a symptom of destroyed tissue could also just as plausibly be "the attempt by the person to adapt to come to terms with that damage" (p.60). Others after him have postulated that at least some of the deviant linguistic production is an attempt to 'ease the communicative load' or 'prevent computation overload' (*ibid.*). Even the behaviourist account of schizophrenic language behaviour allowed for an interpretation that went beyond deviance: Mednick (1968) maintained that disorganised thinking (evidenced by disorganised speech) reinforces itself, because irrational thinking is an anxiety-reducing mechanism for the schizophrenic.

There is evidence that at least some aspects of SLB are explicable in terms of coping, not merely deficit. For example, Rochester & Martin's (1979) findings that schizophrenics tend to rely on pointing to things instead of naming them can be interpreted as a means of achieving distributed cognition – in other words, using the world 'out there' in combination other minds to complete a 'thought', to communicate successfully in lieu of speech. Or that, aware of their communicational difficulties, NTD schizophrenics' apparent striving to keep things simple on purpose is also strategic. Similarly, Schoeman (2008) reports that schizophrenics choosing to speak in their less-fluent second language have traded 'correct speech' for improved cognition and communication, by deliberately slowing themselves down. Even the more florid examples of SLB, like glossomaniac chaining, could potentially be explained in terms of attempting to cope – the apparent failure to 'edit' their utterance internally before saying it out loud could also be seen as an attempt to direct their thinking (perhaps even enlisting the help of the interlocutor) towards their intended goal. Ultimately,

there is reason to believe that schizophrenics, like aphasics (Goodwin, 2003b), can potentially make use of resources in their environment to achieve meaning.

Since the integrational approach contends that no strict dividing line can be drawn between the verbal and the nonverbal, someone relying on traditionally-styled non-verbal elements does not need to be described in terms of deficit, since the verbal and the non-verbal are seamlessly integrated, according to the principle of cotemporality. The schizophrenic is actively choosing the means of communication that they can make work, thus they retain integrational proficiency in such instances, if they are able to integrate activities. Integrationists wouldn't assume, on the basis of comparison to some ideal, that all deviance from the norm is a case of deficit. They would evaluate the situation on an individual basis.

5.4 The not-so-ideal (excluded) real 'speaker'

References to multilingual patients are found as far back as Bleuler (1950[1911]): he remarked that, in writing, "[m]ultilingual patients freely intermingle language or use the tongue with which they are least familiar" (pp.157–158), and further that generally, in bilinguals, compulsive speech would only occur in their mother tongue. Thus, given that monolinguals constitute the minority of the world's population (De Zulueta *et al.*, 2001) (and thus a roughly similar ratio should be reflected in the schizophrenic population), and that this is hardly a newly discovered phenomenon, one is prompted to ask why there is so little literature on this topic, and why none of the recent wide-ranging reviews of language in schizophrenia (e.g. De Lisi, 2001; Kuperberg & Caplan, 2003; Covington *et al.*, 2005; Marvel, 2006) even mention multilingual schizophrenics. Admittedly, the paucity of literature on the topic must be partly due to practical or logistical problems in the availability of bilingual clinicians and researchers (Schoeman, 2008), but this cannot serve as a global explanation for the lack of interest in this area. For the few studies that do exist have produced findings that strike at the heart of many of the assumptions on which schizophrenic language research is based.

The albeit sparse literature on the topic points to the fact that multilingual schizophrenics can present differently in their different languages⁶⁴ (e.g. Schaechter, 1968; Hemphill, 1971; De Zulueta *et al.*, 2001; Schoeman, 2008). This seems to be particularly true of those who have learned a second language relatively late in life (i.e. in late childhood). Speaking and/or being addressed in their first language, a multilingual schizophrenic may appear floridly psychotic, express delusions, complain of auditory hallucinations, and display disorganised speech, and even difficulty in comprehension. The same patient, when speaking and/or being addressed in their second language, may display and report few psychotic features, and their speech, while perhaps not technically 'correct' or fluent, does not leave the interlocutor with a general sense of confusion. In addition, Schoeman (2008) reports on three patients who seemed to actively *choose* to speak in their imperfectly acquired second language starting in the prodromal phase of their disease. Furthermore, there is evidence that second-language acquisition in adults already diagnosed as schizophrenic is not impaired (Bersudsky *et al.*, 2005). These findings throw a rather large spanner in the works of most mainstream theories of schizophrenic speech.

If a language is a fixed and bounded code, then there would be little significance as to what language the patient spoke, beyond perhaps when the patient does not speak *the same language* as the clinician, which according to orthodox views, would prohibit communication altogether. Otherwise, as long as the patient is sufficiently proficient in the same language (even if it is not their mother tongue) as the clinician, he or she should be able to successfully 'send' the content of his or her thoughts encoded in this language to the clinician, who will decode the message and determine whether the content and/or the form is psychotic or normal. Studies of multilingual schizophrenics pose a threat to these generally accepted ideas of SLB, i.e. that the speech produced by schizophrenics is a good indicator of, or even a reflection of, strangely or deviantly formed thoughts which are formulated prior to expression. While there is a sense in some of these studies that a second language 'masks' psychotic symptoms, an integrational approach would conclude that, since the patient is able to successfully integrate activities, i.e. communicate, when speaking their second language,

⁶⁴ I use the term 'languages/a language' in the sense that it has reality for the lay language user, and without appealing to orthodox notions of a language being a fixed and bounded code.

they do not simply *appear* less mad – they literally are less or not at all psychotic. Thus, it also poses a challenge to the traditional mad/normal dichotomy.

These findings should not come as a surprise to integrational linguists, who recognise that ‘coming into’ language (usually roughly designated as *a* particular language, although this may involve more than one) as a child is simultaneously a coming-into personhood (Toolan, 1996) and an embedding in culture and society (Cowley, 2006). Thus, even on a neural level, networks related to what it means to be a person, what it means to be an I in the presence of a You, and all the myriad subtleties related to being in the world which we take for granted, but which seem to disintegrate in schizophrenics (what Sass [2004:305] calls the “loss of natural self-evidence”), are intimately bound up in the first language one learns. On the other hand, one’s experience of a later-learned language may be more abstract, code-like, particularly considering the way additional languages are taught in literate cultures.

Interestingly, studies of multilingual aphasics are much more common. Clinicians have documented the peculiar phenomenon that an aphasic may be left with one language intact, or during recovery, regain use of one language before another (Aglioti *et al.*, 1996). Considering the numerous studies comparing aphasics and schizophrenics, particularly since the mid-1970s, it is even more surprising that multilingualism is a topic that has received so little attention in schizophrenia studies. I suggest that it is very a specific idea of the relationship between language and thought, and the relationship between cognition and communication, that drives the downplaying of studies of bilingualism in schizophrenia, but not in aphasia. For bilingual aphasics, different performances in different languages can simply be explained as a case of one route to expression being temporarily blocked (or cut off forever), resulting in pre-existing thoughts being channeled through the other available route – it poses little challenge to orthodox linguistics.⁶⁵ If, however, the thoughts or their form are what is problematic in schizophrenia, how could they come out ‘normal’ in another language? Clearly, speaking in a language is not simply a case of thought expression or transference. One’s thinking is intimately bound up in both the language one is spoken to, and the language one speaks. From the integrational and dialogic perspectives, the

⁶⁵ This is not to say that all research on aphasia relies on an orthodox account of what languages are and how they work, but it is beyond the scope of this thesis to comment on trends in mainstream aphasia research.

thought/language divide melts away. If thought is achieved, in part, through communication, particularly the kind of cognition that goes on around conversation, then an inability to communicate successfully is an inability to achieve (distributed) cognition. Paradoxically then, speaking 'poorly' (in a second language) may aid both thinking and communication.

Similarly, research on deaf schizophrenics does not garner a mention in any of the major reviews mentioned above. Admittedly, deaf schizophrenics *are* a minority, and here again, the lack of hearing clinicians who can sign is a factor contributing towards the dearth of literature. However, as with writing, considering the spatial nature of sign language, one would imagine that research in this field would be extremely valuable in providing a measure of perspective to field dominated by speech-based linguistics (which in turn is itself biased towards a writing-based account of language).

Unfortunately, existing research (Thacker, 1994, 2001; Trumbetta *et al.*, 2001) seems to be concerned with demonstrating that the 'same' features are found in the speech of hearing as in the signing of deaf schizophrenics. The potential for a shift of focus that studies of deaf schizophrenics pose risks being obscured by their being made to fit within the existing categories, rather than allowing them to mount a challenge to the orthodox view. An integrational approach to sign language would steer away from superimposing upon it these pre-ordained linguistic categories. While I am not aware of a comprehensive integrational linguistic account of sign language, such an account would surely make use of some of Harris' (1995) insights (made within the context of writing) into the temporo-spatial realm of communication.

5.5 Writing

What should be clear from Chapter 3, is that there simply is no theory of schizophrenic writing. While the terms 'schizophrenic language' and 'schizophrenic speech' have been used almost interchangeably over the last century (except where authors are making a point about a distinction between competence and performance – e.g. Schwartz [1982]), schizophrenic speech has almost exclusively provided the data for theories of schizophrenic language. And yet, schizophrenics' writing was described in the earliest literature. Kraepelin (1919) observed that incoherence is expressed in writing as well as drawings (what he called 'metamorphoses'),

and noted schizophrenics' "whimsical misuse of punctuation" (p.66), invented orthography, weird forms, unusual pressure or speed. Bleuler (1950[1911]) described similar features (catatonics, for example "love to play with punctuation marks" [p.188]), and recorded instances of where patients could express themselves clearly in writing but not in speech, or vice versa.

To be sure, numerous studies have required that schizophrenic subjects write their response (e.g. paper and pencil tests), or the linguistic material they are being tested on is presented in written form, but that the written form is being used is almost never regarded as a significant feature of the test design. Part of the problem, if Harris (1995) is anything to go by, is that no suitable, systematic theory of 'normal' writing (as a means of communication independent of speech) exists.

Both De Lisi (2001) and Crow & Done (1997) make reference to studies which have involved writing; Crow doesn't emphasise writing's significance in any way, while De Lisi puts superior performance in written tasks down to writing's lower demand on working memory. While that surely plays a role (speech is only retained in the memory for a few seconds, while writing 'lasts' beyond the communication event – Auer, 2009), it is fairly reckless to tidy away such findings without a thorough investigation. In addition, if one considers the supposed hemispheric division of the spatial and temporal characteristics of language, on which theories such as Crow's (1997) depend, that the temporo-spatial dimension of writing has not been considered significant enough to warrant special attention is indeed surprising. Predictably, an integrational approach would treat schizophrenic writing as a means of communication in its own right, using Harris' (1995) integrational account of writing as a starting point.

5.6 Auditory hallucinations

It is quite strange that current overviews of SLB do not include a discussion of auditory hallucinations. There is a tendency to treat 'hearing voices' as a completely separate phenomenon to disorganised speech. Perhaps this is partly due to auditory hallucinations being a first-rank symptom, while disorganised speech is not. More than likely, it is also due the artificial separation of 'a thought' and 'the language in which it is expressed' in orthodox

linguistics. The main exception to this rule is Crow's theory which posits a similar and related cause behind disorganised speech, auditory hallucinations, and other delusions of thought.

Auditory hallucinations and SLB have not always been regarded as such separate entities. Although McKenna (2007) treats discussions of FTD and hallucinations as two distinct categories, he does make mention, unlike the reviews of SLB used in Chapter 3, that there are theories which characterise auditory hallucinations as a type of talking to oneself – some patients appear to be subvocalising what they report as auditory hallucination (in fact amplifying their subvocalisations in some cases reveals a two-way conversation between expressed speech and inner voices). However, these theories' failure to provide proof in the face of scientific experiments means that there "is a hint – no more – of a relationship with inner speech" (p.224) – a hint which most accounts of SLB simply choose to ignore. Another big hint, discussed above, are the findings based on multilingual schizophrenics, whose auditory hallucinations seem intimately related to the particular language they are speaking and/or are spoken to (e.g. Schaechter, 1968; Schoeman, 2008).

If, as integrational linguistics holds, thought is a form of self-communication, and (through its alignment with distributed cognition) speech is a form of distributed/socially achieved thought, it seems clear that from an integrational perspective, these two 'symptoms' of schizophrenia surely cannot be treated as wholly independent. To be sure, not all patients with FTD hallucinate, and vice versa, but that by and large these variables have not been controlled for in studies of schizophrenic disorganised speech is in itself problematic. In fact one very recent study illustrates just this: DeFreitas *et al.* (2008) found that while "semantic dysfunction was significantly correlated with level of hallucinations" (p.307), no such relationship was established between semantic dysfunction and FTD severity.

An organisation like Intervoice⁶⁶ (Intervoice, n.d.) is evidence that auditory hallucinations, at least for some people experiencing them, have meaning, and can even be construed in a

⁶⁶ Intervoice is an international organisation that provides support and a forum for voice hearers (this is not restricted to schizophrenics) – without assuming the experience is negative and needs to be solved with medication – and disseminates information on the phenomenon.

positive light. Jenkins (2004:36–38) tells of a voice-hearing psychologist whose coping strategy is to engage with the voice as meaningful, in order to deal with the incongruity that it appears to be alien to herself, although she ‘knows’ otherwise. From an integrational proficiency point of view, for a voice hearer, the interaction may not be that different from conversation with another individual. In fact, as Thomas, Bracken & Leudar (2004) put it, such a so-called symptom “may better be understood as part of a series of processes that are reconstitutive of the self” (p.18).

5.7 Metaphor

Although the current mainstream (Anglo-American) approach does not place too much emphasis on schizophrenics’ ability to cope with metaphorical versus literal language, both the former popularity of investigating schizophrenics’ abilities to deal with figurative language (best illustrated in the preoccupations of the papers collected in Kasanin, 1964a[1944]), and its decline, can be attributed in some measure to attitudes underpinned by the language myth. The common thread running through these theories is that schizophrenics tend to misinterpret metaphorical language literally.

Metaphor, as we have seen in Chapter 2, poses a problem for fixed-code linguistics, and it is possible that this contributed to the decline in interest after linguistics became intimately involved in theories of psychotic language. That metaphor dominated the early years of research into schizophrenic was based on the underlying misconception that metaphor is a deviation from normal language use that requires specific abstract thinking abilities. Fallacious concepts of metaphor have been expressed in terms of information processing (literal meaning must be processed before metaphorical meaning can be accessed – e.g. Walsh, 2001), in single-word (in the context of a sentence) testing and the “long tradition” of proverb testing (Pavy, 1968:166), and in the treatment of the content of schizophrenic speech as delusional, by default (i.e. a belief that schizophrenics cannot handle metaphorical language implies that everything they say that is not literally true must therefore be delusional – see Chapman, 1968).

A more recent⁶⁷ approach to this topic is the hypothesis that difficulty with metaphor is the result of impaired theory-of-mind ability (Brüne & Bodenstein, 2005). Apart from the fact that integrationists do not endorse the TOM construct, this explanation relies on the notion of words having fixed meanings, and that to understand metaphor the hearer needs to realise (by being able to adequately form a representation of their mind) that the person using it does not intend the words to have their 'usual', literal meaning, but a special/extended/different one. This study does insightfully acknowledge that proverbs are not merely samples of metaphorical writing, but rather that they have a social function. Nevertheless, these continue to be treated as decontextualised samples.

That so-called metaphorical language has a particular purpose in communication – the fact that metaphor is, according to Toolan “the name of a practice” (1996:56), and not a thing or a quality – has been overlooked. This is not to say that investigations of figurative language have no place in an integrational account of schizophrenic language; rather, it has been a case of barking up the wrong tree. If, as Toolan claims, metaphorical language is a risk-taking manoeuvre, there is reason to believe, for example (based on Rochester & Martin’s [1979] findings), that non-thought-disordered schizophrenics would avoid using metaphorical constructions, or presuming that someone else was using them. Similarly, if metaphorical language has the potential of enhanced intimacy, there are perhaps legitimate reasons for some schizophrenics to avoid using metaphor, or perhaps, to use it a great deal.

Interestingly, in one of the few approaches entertaining the possibility that schizophrenics may be using metaphor some of the time, and that their content may actually be of importance, Forrest (1968) relays authors Bruch & Palombo’s findings that adult schizophrenics tend to make use of

clusters of metaphors which derive their material from the topological relationships by which infants between the ages of eighteen months and two years must order space, being as they are ignorant of perspective and geometry.

⁶⁷ It would seem that the literal/metaphorical dichotomy still holds some interest for European scholars, considering the source of recent publications on this topic, e.g. Bergemann, *et al.* (2008); Rapp, *et al.* (2008); Tavano, *et al.* (2008).

These relationships involve ‘the properties of figures which are conserved through any deformation which maintains the singleness of the figure, namely relationships of closeness and distance, separation, sequence, continuity and enclosure.’ [Bruch & Palombo, 1960, quoted in Forrest] In other words, these are qualities of travel, of mapping, of opening and closing and containing; and, in a less mathematical sense, of texture and the touch of surfaces. These are properties that one does not have to see to know. They cannot be known at a distance, but require palpation. [p.177]

While I cannot verify this with corroborating evidence, such claims – for which an orthodox account of metaphor simply has no place – are surely of interest to integrational linguists, particularly within the context of what Lakoff & Johnson’s (1999) embodied philosophy has to say about the intimate relationship between perception, metaphor and cognition, and Cowley’s (2004, 2006) theory of human development.

5.8 Meaning

Questions like “Does this schizophrenic’s utterance contain meaning?”, or observations that the schizophrenic uses a known word but with a different/peculiar meaning to what it is assigned in that language, or speculation that it appears a word has become separated from its meaning within the schizophrenic’s brain, only make sense within the framework of the language myth. To be sure, schizophrenics do appear to have difficulty with achieving meaning in communication, but that does not automatically validate the idea of a disintegrating mental dictionary. Such descriptions need to be seen for the metalinguistic attempts to make sense of the situation (on the part of the listener) they are. In addition, to speak of pragmatic difficulty or discourse disorder or contextual processing failure all still smack of some ‘applied language centre’ in the brain that has broken down. Crucially, it ignores the integrational linguistic/dialogistic insight that meaning is situationally and collaboratively achieved. It is a fundamental difficulty with meaning-making, not with decoding or encoding, that characterises SLB.

While the characterisation of schizophrenia as a semiotic disorder (Harrod, 1986) has not dominated mainstream accounts, it has been argued that the schizophrenic undergoes

‘symbolic distortion’, and a “retreat into a world of words” (Richman, 1968). This, much like Freud’s conception of the disease, gives the impression that the schizophrenic is in some sense operating purely at the second-order level of language championed by orthodox linguistics, and merely simulating⁶⁸ language. Thus in these moments they embody Harris’s ‘communicational cripple’, who has a perfectly intact mental dictionary and mental grammar book, and yet can’t engage in the flow of communication that most humans find effortless. A more acerbic equation of Chomsky’s theories with severe impairment is found in Chaika (1990):

There is no context-free meaning. There is no context-free syntax. There is no meaningless generative cycle which produces an infinity of sentences. Actually, I should amend that last sentence. It seems to me that psychotic glossomania is the archetypal meaningless generative cycle which can be uttered as an infinite number of sentences. [p.101]

Harrod’s lone contribution to the language/thought debate that raged in the early 1980s could be revived within an integrational linguistic account of SLB. There is no doubt that the schizophrenic may experience a shift in signification. Some report that in the prodromal phase ‘everything seemed strange’ (Covington, *et al.*, 2005) – apparently neutral items or events took on special meaning. The schizophrenic is unwittingly creating signs in situations that having meaning only for them. Based on the ‘other-orientation’ that integrationists posit is necessary for communication, it is not hard to see how this could lead to delusions about some entity ‘sending’ messages to the schizophrenic (without invoking a TOM brain module).

Many theories of SLB characterise the schizophrenic as being distracted by or preoccupied with one half of the biplanar sign (either sound/form or meaning – e.g. Chaika [1974]), or that he or she experiences a splitting of the sign (which in modern accounts is translated into hemisphere miscommunication – e.g. Crow, 1997); in integrational semiology, this makes no

⁶⁸ The notion of ‘simulating language’ was sparked by a quotation in Rochester & Martin (1979:179), where they cite Nöth’s opinion that schizophrenic speakers sometimes appear to be merely simulating textual cohesion.

sense, since the sign only comes into existence within the situated communicational context. The schizophrenic who has difficulty communicating, fails to adequately create signs. With altered social cognition, other-orientedness, they are potentially impaired in their capacity to assign signhood, in the moment. Thus successful communication for the schizophrenic, as for the 'normal' speaker, does not rely on a static body of knowledge housed in the brain (forcing theories to account for why it is not always 'available'); it is a moment-to-moment integrational proficiency, and an interaction in which the healthy partner is also implicated.

5.9 Context

Although an awareness of the significance of context was apparent in the works of Kraepelin and Bleuler, it is only in recent years, after the lustre of Chomskyan linguistics had faded, that 'context' has reemerged in accounts of schizophrenic language behaviour. Few researchers of SLB would adhere to a strictly context-neutral view of meaning. Being able to use and understand language appropriately in context – pragmatics – is often noted as something with which schizophrenics struggle. Nevertheless, the scriptist approach that allows utterances to be treated as decontextualised 'texts' contributes a version of context that is clearly separate from text, and is fixed in advance.

While the usual approach is to simply note difficulties in context processing (as Kuperberg & Caplan [2003] do), Rochester & Martin (1979) evince a much more nuanced understanding of this entity. Firstly, they make the contrary claim that "TD [thought disordered] speakers... show a profound sensitivity to context" (p.187); however, miscommunication may result from what 'context' entails for the participant themselves. That is,

the listener is continually evaluating the salience of participants, based on the context in which the discourse is occurring. But if context for normal speakers means primarily 'foregoing verbal context' and if for schizophrenic speakers it means 'nonverbal and verbal context,' then there may be many miscalculations of salience by normal listeners [p.173]

In addition, "TD speakers," they tell us, "depend less on their own verbal context and more on the 'situational' context than other subjects" (p.185).

Toolan (1996) has made the integrational approach is clear – we cannot be too confident about the line between text and context. Such distinction cannot be given in advance. Thus what is salient as context is not a constant across situations. While they still reify context, the sensitivity displayed by Rochester & Martin is a good start. However, there is another dimension to context that is almost universally ignored by theorists of SLB: the gathering of linguistic data.

Apart from the fact that the implied demands of the testing situation may elicit “irritability, frustration, defensiveness, which quickly leads to resistance” (Lorenz, 1968:37), or that from a behavioural point of view, it has been argued that when clinicians pay particular attention to feature of a schizophrenic’s speech, they can end up reinforcing this behaviour (Staats, 1968), whether interview or pen-and-paper test, the situation is always dialogic. Ultimately, there is no neutral testing ground. The dialogical nature of communication always implicates the researcher as within-context, even if they are analysing transcribed speech, and they have never met the patient on whose utterances the text is based. In this latter case, assessment is yet another communication situation, in which traces of the schizophrenic’s speech activity are reintegrated as signs in the new context.

Furthermore, tests geared towards measuring schizophrenic language often *require* that the schizophrenic treat language as a decontextualised entity. Thus in patients who are already having difficulty meaningfully integrating verbal activity in interaction, this surely would exacerbate the problem. In other cases, in order to allow for a long enough piece to transcribe, the speaker is not interrupted. To be sure, in such instances, the normal speaker may not make the same quantity of ‘errors’ of whatever type of being measured. But the testing situation itself is, in part, eliciting the problematic speech. Thus it is not generalisable to other contexts.

Schegloff (2003), within the context of aphasia research, highlights this lack of awareness that the testing situation is a particular interaction in itself. ‘In-frame’ (‘Please say as many words as you can think of beginning with the letter A’) and ‘out-frame’ (‘Yes, you may go to the bathroom.’) utterances tend to be treated separately, by both tester and subject (even though it could be argued that these are both part of one interactional event). It often goes

unrecognised that sustaining this separation, and the test itself, is an achievement on the part of the impaired person, and evidence of their 'pragmatic' ability (p.27).

Swartz & Swartz (1987), in one of the few articles that look at metacommunication in psychotic individuals (their subject suffers from mania), provide a fascinating account that illustrates just how aware their subject is of the usual context of data collection – their psychotic patient attempts to take on the role of the interviewer, since they (one of the authors of the paper) are not performing in accordance with her expectation (the usual batch of questions). Her apparently incoherent discourse is largely a metacommentary on the conversation in which she finds herself situated. I make no claim that all psychotic patients have this level of insight or awareness, merely that there is no *a priori* reason to assume that schizophrenics are not capable of engaging, if not wholly successfully, in the metacommunication that is an inherent, structure-giving feature of communication itself (what Taylor [1997] calls its 'exoskeleton'), that may well be apparent if one looks beyond 'deficit'.

A particularly vivid illustration of this is an anecdote originally reported by Kraepelin, and subsequently analysed by Laing (1960[1975]),⁶⁹ in which a young schizophrenic is brought in front of a group of medical students and asked a question, to which he responds with a barrage of utterances that Kraepelin judges to be pathological, while Laing interprets them as commentary on the bizarre form of communication (endless questions, instructions, but no real conversation) to which the mental patient is constantly exposed in the context of the asylum. An excerpt:

When asked where he [the patient] is, he says, 'You want to know that too? I tell you who is being measured and is measured and shall be measured. I know all that, and could tell you, but I do not want to.' When asked his name, he screams, 'What is your name? What does he shut? He shuts his eyes. What does he hear? He does not understand; he understands not. How? Who? Where? When? What does he mean? When I tell him to look he does not look properly. You there,

⁶⁹ Bentall (2003) also reproduces the anecdote and Laing's analysis.

just look! What is it? What is the matter? Attend: he attends not. I say, what is it, then? Why do you give me no answer? Are you getting impudent again?... [p.29]

On an even broader scale, mainstream studies of schizophrenia largely ignore the context of culture.⁷⁰ Invoking the cultural dimension of human and thus schizophrenic experience goes beyond the more banal observation that schizophrenic symptoms' 'content' differs from cultural context to cultural context,⁷¹ or that in some cultures, seemingly schizophrenic symptoms are given special significance (Helman, 2001). Much more fundamentally, if, as Cowley (2004, 2006) maintains, one's embedding in culture is begun and sustained by jointly constructed activity (i.e. not passive), then any apparent disembedding must be jointly constructed too. However, there is no culture-neutral way of being human, whether 'sane' or 'insane' – individuals may however find themselves “at the margins of culture, at the very edge of meaningful experience” (Jenkins & Barrett, 2004:5). Although “the subjective experience of persons with schizophrenia is forged at the nexus of culture and agency, desire and attachment, none of which are annulled by disease process” (Jenkins, 2004:30), the mainstream discourse on schizophrenia characterises schizophrenics as “liv[ing] in private worlds, largely cut off from culture and history” (Hoerl, 2001:83).

5.10 Interpersonal accounts

The overwhelming focus on, and location of symptoms within the individual has all but obscured the role of 'normal' interlocutor in studies of SLB. Thus even a study like Rochester & Martin (1979), which aims to account for the normal listener's experience of schizophrenic speech, in practice attempts to remove the interlocutor from the equation as far as possible. “The modern preoccupation with individuality... is really just a fantasy, a form of self-delusion, since all individual expressions, achievements and freedoms depend primarily on social expressions, achievements and freedoms,” Burns (2007:182) tells us. If these positive, supposedly individual characteristics are really social in nature, then it follows that so too are supposedly individual deficits and failures. This does amount to *blaming* the

⁷⁰ Just like 'a language', I use this term without the assumption that 'a culture' is a homogenous entity; rather, particularly on the smaller interpersonal scale, 'a' “culture may be contradictory, fragmented, contested, and politicized, rather than necessarily coherent or uniform” (Jenkins & Barrett, 2004:5–6).

⁷¹ For example, Roman Catholic schizophrenics from Northern Ireland are more likely to have delusions involving the Virgin Mary, while schizophrenics from America may have delusions about alien influence (Helman, 2001).

interlocutor for communication failure, but merely acknowledges that what poses as description of communicational behaviour in the individual is really culturally-infused metacommunicative interpretation. In psycholinguistic terms, the listener's confusion is put down to the schizophrenic's failure to edit. The integrationist is curious: why is it not as much a failure of repair on the listener's part? And is the listener not failing to anticipate something of the schizophrenic speaker (a skill which could be improved with familiarity and practice)?

That schizophrenia, as a disorder characterised by altered subjectivity, and thus also by altered *intersubjectivity*,⁷² has by definition an interpersonal dimension to it is clearly not appreciated by current mainstream theories. Burns (2007:75) agrees: "Cartesian dualism is so pervasive in our psychiatric attitudes, language and culture that we are oblivious to the interpersonal, social and existential aspects of our patient's experience". Once-popular accounts that may have espoused such a view are lucky if they get a mention in modern mainstream reviews. Thus, Bateson's double-bind, Fromm-Reichman's schizophrenogenic mother, and Laing's theories of communication have all been summarily discarded. To be sure, many of their findings are unproven and unprovable, their methods generally unscientific (Frith & Johnstone, 2003), but this is partly the point; these theorists were touching on something quite fundamental that has been all but overlooked by the biomedical, individualised version of SLB – the clinician is the measuring tool. That 'something' is partially captured by the long-documented 'praecox feeling' (Rumke, 1941 in Ungvari, *et al.*, 1997), an uneasy feeling and lack of empathy produced in the clinician in the presence of a schizophrenic, and embodied by the 'inferential tradition' – whereby clinician's impressions are transformed into symptoms belonging to the patient (Rochester & Martin, 1979:3) – that still characterises SLB theories, whether it is acknowledged or not. There is no neutral way of defining 'symptoms' of communication; they are always, already interpretation, infused with the trace of the clinician's participation.

As Pavy (1968:176) predicted 40 years ago,⁷³ the time has come to "account for the diagnostician's perception and categorization of speech as it is to study the patient's

⁷² See Jenkins's (2004:47) reference to Jessica Benjamin's work.

⁷³ See quotation on page 118 above.

production”. Thanks to the involvement of the orthodox linguistics, theories like Sullivan’s ‘consensual validation’ (Kasanin, 1964c[1944]) – whereby communication is based on shared expectation, not necessarily knowledge – have had to wait for the wheel to be reinvented in order for their value to be recognised. Thus, an impression that it is as if their imaginary or internalised auditors are like themselves, and thus at odds with the real auditors ‘out there’ in the world (Forrest, 1968, discussing Sullivan’s theory), has clear parallels with Frith’s application of ‘theory of mind’ (McKenna, 2007), or Burns’ (2007) ‘social brain’; perhaps if psychiatry hadn’t been mesmerised by codist approaches to language, these ideas would have come to the fore decades ago.

From an integrational perspective, it is our sustained communication with others, an ability to integrate our activities with them (enabled by our genetically endowed human capacity for dialogue [Linell, 2005] or other-orientation [Toolan, 1996]) that upholds and reinforces our ‘linguaging’ ability – not the other way round. Gillet (2004:29), although not an integrationist, captures this sentiment quite poetically:

Psychotics think and move in strange ways, sketching and filling in their perceptual worlds differently from those of us who march to the beat of the shared cognitive drum. This difference alienates them from the rest of us, and they experience the confusion and distress of being apparently abandoned in a world that has not only lost its familiarity but in which they are cast adrift from the guides that would normally sustain their participation in it.

Furthermore, sensitivity to others, the sense that something may be ‘not quite right’, is part and parcel of our responsive ‘linguaging’ interactions with others. Since integrationists define rationality in terms of the fit of behaviour (linguistic or not) with context, determining rationality or irrationality is very much a situated, interpersonal activity.

5.11 Debate

That the question ‘is there a schizophrenic language?’ was even treated seriously in the first half of the twentieth century is a result of the language myth. The reason for its largely across-the-board dismissal is empirical, not theoretical: no one ever succeeded in creating a

“schizophrenic dictionary” (Forrest, 1968:154). This hasn’t stopped a few lone voices attempting to argue the case (e.g., Wolcott, 1974; Wróbel 1990). The more sustained debate has focused on whether there is something unique about the way schizophrenics speak, and whether this is a feature of their speech or their thought. While McKenna dismisses much of this debate due to its having “revolved around the fine points of linguistic theory” (2007:241), Rochester & Martin (1979) see this not as grounds for dismissal, but a crucial point worthy of recognition.⁷⁴ On this, the integrationist couldn’t agree more; however, their ultimate goal reveals them to still be mired in the segregationist mindset. By expanding the definition of language (in an attempt to ‘stay in the game’ – see Martin [1982]), they tack on another level of rule-based behaviour (discourse/pragmatics), but keep the overall orthodox abstraction intact, ultimately violating the integrationist ‘principle of non-compartmentalisation’ which claims any separation between linguistic knowledge and pragmatic knowledge is artificial.⁷⁵

The ‘fine points of linguistic theory’ around which the debate has centred are entirely the product of the language myth, the second-order abstractions from actual language experience. Within the context of integrational linguistics, and its conception of what a language is and how communication happens, the endless back-and-forth distraction of attempting to classify SLB as evidence of a speech disorder, thought disorder, semiotic disorder, or information-processing disorder, to name a few, fades into insignificance. Rather than quibbling about labels and levels, what is of significance is to give an account of the actual lay language user’s (both normal and schizophrenic) experience – their first-order reality.

5.12 Conclusion

From the integrational linguistic perspective, some of the approaches that have in the past, or still do dominate mainstream research on SLB, are unthinkable. To attempt to explain a disintegration within an individual, and of their connections to society and environment, by starting with a model that is already segregated, disintegrated, is absurd. In addition, some

⁷⁴ See quotation on pages 126–127 above.

⁷⁵ A similar point has been made by Schegloff (2003) exploring aphasia from the perspective of conversation analysis (CA).

approaches that have not been given time of day by the mainstream approach hold interest for integrationists, particularly in the potential they have for showing up why the orthodox account is flawed.

The now long-standing tradition of comparing schizophrenics to aphasics has an added dimension of insight to offer, in the recent publication of a Conversation Analysis approach to aphasia (Goodwin, 2003a). Taking its cue from such work, an integrational approach would balance the prevailing biomedical view with the added interpersonal and environmental dimension. But, by its very nature, integrationism doesn't see these as three separate categories, but that they are intrinsically interwoven – in fact to treat them as separate makes no sense; it denies their very nature informed by the fact that bodies, brains, and world have co-evolved.

It would pay real attention to lay experience of the schizophrenic and the normal interlocutor, their metacommunicative strategies at achieving meaning, and not privilege orthodox linguistic theories' versions of events. While it is hardly noticeable in the mainstream literature, schizophrenics can and do think and talk about their experiences of communication. Estroff (2004) gives an uncompromising account of how keenly aware schizophrenics are that not only are they not understood, they are not listened to; their experience is completely disregarded.⁷⁶ More than that, "the suffering of persons with schizophrenia is substantially constituted by others' ... cultural ambivalence and reluctance to grant them full 'human' status" (Jenkins, 2004:43). It is here that long-since-discarded interpersonal theories like those of R.D. Laing could be revived – without conceding a wholesale acceptance of his views.

That an integrational account of psychotic language behaviour is overdue is not merely being argued for the benefit of insight in psychiatry. Integrational linguistics itself has to be able to give an account of all language behaviour. It cannot pre-classify rational and irrational speech on the basis of diagnosis. Rationality 'exists' (or rather, is jointly constructed in an encultured way) from moment to moment, and a diagnosis or label like 'schizophrenic' should not be

⁷⁶ Also see Jenkins's anecdote (2004:43) regarding a schizophrenic who declares with relief that the ethnographer "sees him as *human*" (original emphasis).

used as invisible parentheses around every aspect of such an individual's language behaviour. To do this, Schegloff (2003) says, is to dismiss these individuals as little else that (impaired) language users, and not "actors with things to do, lives to live, things to give and to request and to tell and to promise, memories to share and call upon in getting their interactional business done, with language among the resources to do those things" (p.44). Thus we should recognise the role that both researchers' and lay interlocutors' metalinguistic strategies towards schizophrenics' language behaviour play in *determining* whether they are speaking sense or not. Such metalinguistic activity is the business of integrationists.

CONCLUSION

If there is one word that summarises schizophrenia, it is ‘strangeness’, both for normal speakers encountering schizophrenics, and the experience of schizophrenics themselves. Schizophrenia casts into sharp relief much of the daily experience ‘normals’ take for granted. This strangeness has been the subject of much myth and misunderstanding over the last century, thus this thesis began with an attempt to clarify what exactly schizophrenia is and is not. What was clear from Chapter 1 is that schizophrenia is by no means a homogenous entity.

Schizophrenia being the mainstay of psychiatry, conceptions of the disease have been shaped by the political and theoretical debates that have driven the field. While theories have come and gone, one feature or symptom of the disease that has consistently been noted since its inception is that schizophrenics speak strangely, at least, some schizophrenics, some of the time. Naturally it is this feature that is of interest to the linguist.

But ‘the linguist’ has turned out to be someone who is thoroughly blinded by what integrational linguistics call ‘the language myth’ – age-old assumptions about what languages are and how they work which are clung to in the face of compelling evidence to the contrary. Chapter 2 outlined some of this evidence by detailing the main principles and standpoints espoused by a critically minded linguistics – integrationism, complemented by the closely related dialogic approach – which opposes the orthodox tradition.

In Chapter 3, I provided evidence that the myths of orthodox linguistics dominate current mainstream research in the field, and serve to reinforce the joint assumptions about languages and minds on which linguistics and psychiatry are based. Chapter 4 revealed that current overviews of the topic tend to airbrush out significant chapters in the history of research into SLB, particularly those theories which tend towards interpersonal accounts of schizophrenia.

Finally, in Chapter 5, I demonstrated just why the orthodox linguistic approach fails to truly account for the phenomenon it purports to be helping to describe and explain. As remedy, I

sketched briefly the potential integrational linguistic response. This sketch as a whole is a suggestion for future research. More specifically, future research needs to recognise that communication is an ongoing, endless activity between and within humans using the resources at their disposal. Metacommunicationally, the non-schizophrenic (lay or professional) potentially stymies schizophrenics' attempts at making sense before they even start. The received, commonsense non-sense about language that has prevailed in studies of schizophrenic language behaviour needs to be replaced by an account that truly makes sense of the first-order experience of both schizophrenics and their normal interlocutors in communication interactions, by taking into account the ever-present second-order constructions in which we all deal.

REFERENCES

- A Beautiful Mind*. 2001. Directed by Ron Howard. Imagine Entertainment.
- Aglioti, S., Beltramo, A., Girardi, F. & Fabbro, F. 1996. Neurolinguistic and follow-up study of an unusual pattern of recovery from bilingual subcortical aphasia. *Brain*, 119:1551–1564.
- Andreason, N.C. 1979. Thought, language and communication disorders: I. Clinical assessment, definition of terms, and evaluation of their reliability. *Archives of General Psychiatry*, 36(Nov):1315–1321.
- Andreason, N.C. 1982. Should the term “thought disorder” be revised? *Comprehensive Psychiatry*, 23(4), July/August:291–299.
- Auer, P. 2009. On-line syntax: thoughts on the temporality of spoken language. *Language Sciences*, 31:1–13.
- Bentall, R.P. 2003. *Madness Explained*. London: Allen Lane.
- Bergemann, N., Parzer, P., Jaggy, S., Auler, B., Mundt, C. & Maeir-Braunleder, S. 2008. Estrogen and comprehension of metaphoric speech in women suffering from schizophrenia: results of a double-blind, placebo-controlled trial. *Schizophrenia Bulletin*, 34(6):1172–1181.
- Bersudsky, Y., Fine, J., Gorjalsan, I., Chen, O. & Walters, J. 2005. Schizophrenia and second language acquisition. *Progress in Neuro-Psychopharmacology & Biological Psychiatry*, 29:535–542.
- Bleuler, E. 1950[1911]. *Dementia Praecox, or the Group of the Schizophrenias*. Translated by J. Zinkin. New York: International Universities Press
- Brown, R. 1973. Schizophrenia, language and reality. *American Psychologist* (May):395–403.
- Brüne, M. & Bodenstein, L. 2004. Proverb comprehension reconsidered – ‘theory of mind’ and the pragmatic use of language in schizophrenia. *Schizophrenia Research*, 75:233–239.
- Burns, J. 2007. *The Descent of Madness: Evolutionary Origins of Psychosis and the Social Brain*. London & New York: Routledge.
- Burston, D. 1996. *The Wing of Madness: The Life and Work of RD Laing*. Cambridge, MA: Harvard University Press.
- Carroll, L. 1960. *The Annotated Alice: Alice’s Adventures in Wonderland & Through the Looking Glass*. Introduction and notes by M. Gardner. Illustrations by J. Tenniel. London: Anthony Bond.
- Chaika, E. 1974. A linguist looks at “schizophrenic” language. *Brain and Language*, 1: 257–276.

- Chaika, E. 1982. Thought disorder or speech disorder in schizophrenia? *Schizophrenia Bulletin*, 8(4): 587–591.
- Chaika, E.O. 1990. *Understanding Psychotic Speech: Beyond Freud and Chomsky*. Springfield, Ill.: Thomas.
- Chaika, E. & Lambe, R. 1985. The locus of dysfunction in schizophrenic speech. *Schizophrenia Bulletin*, 11(1):8–15.
- Chaika, E. & Lambe, R. 1986. Is schizophrenia a semiotic disorder: replies to Harrod. *Schizophrenia Bulletin*, 12(1):14–15.
- Chapman, L.J. 1968. Confusion of figurative and literal usages of words by schizophrenics and brain damaged patients. In H.J. Vetter (ed.). *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas, pp.58–66. First appeared in 1960, *Journal of Abnormal and Social Psychology*, 60:412–416.
- Clark, A.. 1997a. *Being There: Putting Brain and Body Back Together*. Cambridge, MA: MIT Press.
- Clark, A. 1997b. Language: the ultimate artifact. (Chapter 10). In *Being There: Putting Brain and Body Back Together*. Cambridge, MA: MIT Press, pp.193–218.
- Covington, M.A., He, C., Brown, C., Naçi, L., McClain, J.T., Fjordbak, B.S., Semple, J. & Brown, J. 2005. Schizophrenia and the structure of language: The linguist's view. *Schizophrenia Research*, 77(1):85–98.
- Cowley, S.J. 2004. Simulating others: the basis of human cognition? *Language Sciences*, 26:273–299.
- Cowley, S.J. 2006. Bridges to history: Biomechanical constraints in language. In *Language and History: Integrationist Perspectives*, ed. N. Love. London & New York: Routledge, pp. 200–222.
- Crow, T.J. 1997. Is schizophrenia the price that *Homo sapiens* pays for language? *Schizophrenia Research*, 28: 127–41.
- Crow, T.J. 2000. Schizophrenia as the price that *Homo sapiens* pays for language: a resolution of the central paradox in the origin of the species. *Brain Research Reviews*, 31:118–129.
- Crow, T.J. 2008. The 'Big Bang' theory of the origin of psychosis and the faculty of language. *Schizophrenia Research*, 102(1–3): 31–52.
- Crow, T.J. & Done, D. J. 1997. Schizophrenia as a disorder of the capacity for language: the trajectory to 'hemispheric indecision'. In J. France & N. Muir (eds.). *Communication and the Mentally Ill Patient: Developmental and Linguistic Approaches to Schizophrenia*. London: Jessica Kingsley, pp.60–68.

De Decker, B. & Van de Craen, P. 1987. Towards an interpersonal theory of schizophrenia (Chapter 10). In R. Wodak & P. van de Craen. (eds.) *Neurotic and Psychotic Language Behaviour*. Clevedon & Philadelphia: Multilingual Matters Ltd, pp. 249–265.

De Lisi, L.E. 2001. Speech disorder in schizophrenia: review of the literature and exploration of its relation to the uniquely human capacity for language. *Schizophrenia Bulletin*, 27(3):481–496.

De Zulueta, F.I.S., Gene-Cos, N. & Grachev, S. 2001. Differential psychotic symptomatology in polyglot patients: case reports and their implications. *British Journal of Medical Psychology*, 74:277–292.

DeFreitas, C.M., Dunaway, L.A. & Torres, I.J. 2009. Preferential semantic fluency impairment is related to hallucinations, but not forma thought disorder. *Schizophrenia Research*, 107(2–3):307–312.

Distributed Language Group, n.d. Homepage of the Distributed Language Group (DLG) [online]. Available from: <http://www.psy.herts.ac.uk/dlg/index.html> (Accessed 6 April 2009).

Docherty, N.M., DeRosa, M. & Andreason, N.C. 1996. Communication disturbances in schizophrenia and mania. *Archives of General Psychiatry*, 53(Apr):358–364.

Eliseo, T.S. 1968. Figurative and literal misinterpretations of words by process and reactive schizophrenics. In H.J. Vetter (ed.). *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas, pp.67–74. First appeared in 1963, *Psychological Reports*, 13:871–877.

Elsevier, n.d. Schizophrenia Research: an international multidisciplinary journal [online]. Elsevier. Available from: http://www.elsevier.com/wps/find/journaldescription.cws_home/506091/description#description (Accessed 10 February 2009).

Estroff, S.E. 2004. Subject/subjectivities in dispute: the poetics, politics, and performance of first-person narratives of people with schizophrenia (Chapter 11). In J.H. Jenkins & R.J. Barrett (eds.). *Schizophrenia, Culture and Subjectivity: The Edge of Experience*. New York: Cambridge University Press, pp. 282–302.

Forrest, D.V. 1968. Poiesis and the language of schizophrenia. In H.J. Vetter (ed.). *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas, pp.153–181. First appeared in 1965, *Psychiatry*, 28:1–18.

France, J. 2001. Disorders of communication and mental illness. In J. France & S. Kramer (eds.). *Communication and Mental Illness: Theoretical and Practical Approaches*. London & Philadelphia: Jessica Kingsley, pp.15–25.

Frith, C. & Johnstone, E. 2003. *Schizophrenia: A Very Short Introduction*. Oxford: Oxford University Press.

- Fromkin, V.A. 1975. A linguist looks at "A linguist looks at 'schizophrenic' language". *Brain and Language*, 2:498–503.
- Frow, J. 2001. Metaphor and metacommunication in schizophrenic language. *Social Semiotics*, 11(3): 275–287.
- Gillet, G. 2004. Cognition: brain pain: psychotic cognition, hallucinations and delusions. In J. Radden (ed.). *The Philosophy of Psychiatry: A Companion*. Oxford: Oxford University Press, pp.21–35.
- Goodwin, C. (ed.). 2003a. *Conversation and Brain Damage*. Oxford: Oxford University Press.
- Goodwin, C. 2003b. Introduction (Chapter 1). In C. Goodwin (ed.). *Conversation and Brain Damage*. Oxford: Oxford University Press, pp.3–20.
- Harris, R. 1981. *The Language Myth*. London: Duckworth.
- Harris, R. 1987. *The Language Machine*. London: Duckworth.
- Harris, R. 1995. *Signs of Writing*. New York: Routledge.
- Harris, R. 1998. *Introduction to Integrational Linguistics*. Kidlington, Oxford, UK: Pergamon.
- Harris, R. 2004. Integrationism, language, mind and world. *Language Sciences*, 26:727–739.
- Harris, R. 2006. Integrational linguistics and semiology. In K. Brown (ed. in chief). *The Encyclopedia of Language and Linguistics, Volume 5*(Gen–Int). Oxford: Elsevier, pp.714–717.
- Harrod, J.B. 1986. Schizophrenia as a semiotic disorder. *Schizophrenia Bulletin*, 12(1): 12–13.
- Harrow, M., Prather, P. & Lanin-Kettering, I. 1986. Is schizophrenia a semiotic disorder: replies to Harrod. *Schizophrenia Bulletin*, 12(1):15–19.
- Hauser, M.D., Chomsky, N. & Fitch, W.T. 2002. The faculty of language: what is it, who has it, and how did it evolve? *Science*, 298 (22 Nov):1569–1579.
- Helman, C.G. 2001. *Culture, Health and Illness* (fourth edition). London: Arnold.
- Hemphill, R.E. 1971. Auditory hallucinations in polyglots. *South African Medical Journal*, 45(18 Dec): 1391–1394.
- Herbert, R.K. & Waltensperger, K.Z. 1980. Schizophrasia: a case study of a paranoid schizophrenic's language. *Applied Psycholinguistics*, 1: 81–93.
- Hoerl, C. 2001. Introduction: Understanding, explaining, and intersubjectivity in schizophrenia. *Philosophy, Psychiatry and Psychology*, 8(2/3):83–88.

Hoffman, R.E. & Sledge, W. 1988. An analysis of grammatical deviance occurring in spontaneous schizophrenic speech. *Journal of Neurolinguistics*, 3(1):89–101.

Intervoice, n.d. Intervoice: The international community for hearing voices [online]. Available from: <http://www.intervoiceonline.org> (Accessed 4 April 2009).

Jenkins, J.H. 2004. Schizophrenia as a paradigm case for understanding fundamental human processes (Chapter 1). In J.H. Jenkins & R.J. Barrett (eds.). *Schizophrenia, Culture and Subjectivity: The Edge of Experience*. New York: Cambridge University Press, pp.29–61.

Jenkins, J.H. & Barrett, R.J. 2004. Introduction. In J.H. Jenkins & R.J. Barrett (eds.). *Schizophrenia, Culture and Subjectivity: The Edge of Experience*. New York: Cambridge University Press, pp.1–25.

Joseph, J.E. 2003. Orthodox unorthodoxy. *Language Sciences*, 25:99–109.

Joseph, J.E., Love, N. & Taylor, T.J. 2001a. Introduction. In *Landmarks in Linguistic Thought II: The Western Tradition in the Twentieth Century*. London & New York: Routledge, pp.vii–xiii.

Joseph, J.E., Love, N. & Taylor, T.J. 2001b. Harris on linguistics without languages (Chapter 14). In *Landmarks in Linguistic Thought II: The Western Tradition in the Twentieth Century*. London & New York: Routledge, pp.203–218.

Kasanin, J.S. (ed.). 1964a[1944]. *Language and Thought in Schizophrenia*. Collected papers presented at the meeting of the American Psychiatric Association, May 12, 1939 Chicago, Illinois. New York: WW Norton.

Kasanin, J.S. 1964b[1944]. Introductory remarks. In J.S. Kasanin (ed.). *Language and Thought in Schizophrenia*. Collected papers presented at the meeting of the American Psychiatric Association, May 12, 1939 Chicago, Illinois. New York: WW Norton, pp.1–3.

Kasanin, J.S. 1964c[1944]. Concluding remarks. In J.S. Kasanin (ed.). *Language and Thought in Schizophrenia*. Collected papers presented at the meeting of the American Psychiatric Association, May 12, 1939 Chicago, Illinois. New York: WW Norton, pp.124–133.

Kraepelin, E. 1919. *Dementia Praecox, and Paraphrenia*. Translated by R.M. Barclay. Edited by G.M. Robertson. Edinburgh: E. & S. Livingstone.

Kuperberg, G.R. & Caplan, D. 2003. Language dysfunction in schizophrenia (Chapter 19). In R.B. Schiffer, S.M. Rao & B.S. Fogel (eds.). *Neuropsychiatry*, second edition. Philadelphia, PA: Lippincott Williams and Wilkins, pp.444–466.

Laing, R.D. 1975[1960]. *The Divided Self: An Existential Study in Sanity and Madness*. Harmondsworth: Penguin.

Laing, R.D. 1975[1967]. *The Politics of Experience and The Bird of Paradise*. Harmondsworth: Penguin.

- Laing, R.D. & Esterson, A. 1970. *Sanity, Madness and the Family*. Harmondsworth: Penguin.
- Lakoff, G. 1987. *Women, Fire and Dangerous Things*. Chicago: University of Chicago Press.
- Lakoff, G. & Johnson, M. 1980. *Metaphors We Live By*. Chicago: University of Chicago Press.
- Lakoff, G. & Johnson, M. 1999. *Philosophy in the Flesh: The Embodied Mind and its Challenge to Western Thought*. New York: Basic Books.
- Lanin-Kettering, I. & Harrow, M. 1985. The thought behind the words: a view of schizophrenic speech and thinking disorders. *Schizophrenia Bulletin*, 11(1):1–7.
- Lecours, A.R. & Vanier-Clement, M. 1976. A comparative description with comments on Chaika's and Fromkin's respective looks at "schizophrenic" language. *Brain and Language*, 3: 516–565.
- Lewis, N.D.C. 1964[1944]. Preface. In J.S. Kasanin (ed.). *Language and Thought in Schizophrenia*. Collected papers presented at the meeting of the American Psychiatric Association, May 12, 1939 Chicago, Illinois. New York: WW Norton, pp.v–xii.
- Lewis, N.D.C., 1950. Preface. In E. Bleuler. *Dementia Praecox, or the Group of the Schizophrenias*. Translated by J. Zinkin. New York: International University Press.
- Linell, P. 1998. *Approaching Dialogue: Talk, Interaction and Contexts in Dialogical Perspectives*. Amsterdam & Philadelphia: John Benjamins.
- Linell, P. 2005. *The Written Language Bias in Linguistics: Its Nature, Origins and Transformations*. London & New York: Routledge.
- Linell, P. 2007. Dialogicality in languages, minds and brains: is there a convergence between dialogism and neuro-biology? *Language Sciences*, 29: 605–620.
- Lorenz, M. 1968. Problems posed by schizophrenic language. In H.J. Vetter (ed.). *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas, pp.28–40. First appeared in 1961, *Archives of General Psychiatry*, 4:603–610.
- Love, N. 2004. Cognition and the language myth. *Language Sciences*, 26:525–544.
- Love, N., ed. 2006a. *Language and History: Integrationist Perspectives*. London: Routledge.
- Love, N. 2006b. Language, history and *Language and History*. In N. Love (ed.). *Language and History: Integrationist Perspectives*. London: Routledge, pp.1–18.
- Love, N. 2009. Science, language and linguistic culture. *Language & Communication*, 29: 26–46.
- Martin, J.R. 1982. What is language? (Open peer commentary on Schwartz, 1982: Is there a schizophrenic language?) *The Behavioral and Brain Sciences* 5:607–608.

Marvel, C. 2006. Schizophrenia and language. In K. Brown (ed. in chief). *The Encyclopedia of Language and Linguistics*, Vol. 11(Sca–Spe). Oxford: Elsevier, pp.14–17.

McCabe, R., Leudar, I. & Antaki, C. 2004. Do people with schizophrenia display theory of mind deficits in clinical interactions? (abstract only) *Psychological Medicine*, 34(3):401–412. doi:10.1017/S00332917001338

McKenna, P.J. 2007. *Schizophrenia and Related Syndromes* (second edition). Hove: Routledge.

McNally, K. 2007. Schizophrenia as split personality/Jekyll and Hyde: the origins of the informal usage in the English language. *Journal of the History of the Behavioral Sciences*, 43(1):69–79.

Mednick, S.A. 1968. A learning theory approach to research in schizophrenia. In H.J. Vetter (ed.). *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas, pp.75–92. First appeared in 1958, *Psychological Bulletin*, 55:316–327.

Mullan, B. 1996. *Mad To Be Normal: Conversations with R.D. Laing*. London: Free Association Books.

Myers, G. 1940. Freud's influence on psychiatry in America. *Psychoanalytic Quarterly*, 9:229–235.

Neale, J.M. & Oltmanns, T.F. 1980. *Schizophrenia*. New York: John Wiley & Sons, Inc.

Newby, D. 2001. Communication and formal thought disorder in schizophrenia. In J. France & S. Kramer (eds.). *Communication and Mental Illness: Theoretical and Practical Approaches*. London & Philadelphia: Jessica Kingsley, pp.335–350.

Oh, T.M., McCarthy, R.A. and McKenna, P.J. 2002. Is there a schizophasia? A study applying the single case approach to formal thought disorder in schizophrenia. *Neurocase*, 8:233–244.

Pao, P.-N. 1973. Notes on Freud's theory of schizophrenia. *International Journal of Psycho-Analysis*, 54:469–476.

Pateman, T. 1987. *Language in Mind and Language in Society: Studies in Linguistic Reproduction*. Oxford: Clarendon Press / New York: Oxford University Press.

Pavy, D. 1968. Verbal behavior in schizophrenia: a review of recent studies. *Psychological Bulletin*, 70(3):164–178.

Pinker, S. 1995[1994]. *The Language Instinct*. London: Penguin.

Rapp, A.M., Hensler, M., Markert, K., Lengsfeld, I., & Bartels, M. 2008. Nonliteral language comprehension and schizophrenia: more than one deficit? (abstract) *Schizophrenia Research*, 98:20.

- Richman, J. 1968. Symbolic distortion in the vocabulary definitions of schizophrenics. In H.J. Vetter (ed.). *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas, pp.49–57. First appeared in 1964, *Journal of General Psychology*, 71:1–8.
- Robbins, M. 1993. *Experiences of Schizophrenia: An Integration of the Personal, Scientific, and Therapeutic*. New York: The Guildford Press.
- Robertson, J.P.S. & Shamsie, S.J. 1968. A systematic examination of gibberish in a multilingual schizophrenic patient. In H.J. Vetter (ed.). *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas, pp.139–148. First appeared in 1958, *Language and Speech*, 1:1–8.
- Rochester, S.R. 1978. Are language disorders in acute schizophrenia actually information processing problems? *Journal of Psychiatric Research*, 14: 275–283.
- Rochester, S.R. & Martin, J.R. 1979. *Crazy Talk: A Study of the Discourse of Schizophrenic Speakers*. New York: Plenum Press.
- Saks, E.R. 2007. *The Center Cannot Hold: A Memoir of My Schizophrenia*. London: Virago Press.
- Salzinger, K., Portnoy, S. & Feldman, R.S. 1968. Experimental manipulation of continuous speech in schizophrenic patients. In H.J. Vetter (ed.). *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas, pp.123–138. First appeared in 1964, *Journal of Abnormal and Social Psychology*, 68:508–516.
- Sass, L. 1992. *Madness and Modernism: Insanity in the Light of Modern Art, Literature, and Thought*. New York: Basic Books.
- Sass, L. 2004. Negative symptoms, commonsense, cultural disembedding. In J.H. Jenkins & R.J. Barrett (eds.). *Schizophrenia, Culture and Subjectivity: The Edge of Experience*. New York: Cambridge University Press, pp. 303–327.
- Sato, M. 2006. Renaming schizophrenia: a Japanese perspective. *World Psychiatry*, 5(1):53–55.
- Saussure, F. de. 1983[1916]. *Course in General Linguistics*. C. Bally & A. Sechehaye (eds.), with the collaboration of A. Riedlinger. Translated and annotated by R. Harris. London: Duckworth.
- Savage-Rumbaugh, S., Shanker, S. & Taylor, T.J. 1998. *Apes, Language and the Mind*. New York/Oxford: Oxford University Press.
- Schaechter, F. 1968. The language of the voices. In H.J. Vetter (ed.). *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas, pp.149–152. First appeared in 1964, *The Medical Journal of Australia*, 2:870–871.
- Schegloff, E.A. 2003. Conversation analysis and communication disorders (Chapter 2). In C. Goodwin (ed.). *Conversation and Brain Damage*. Oxford: Oxford University Press, pp.21–55.

Schoeman, R. 2008. Differential expression of psychotic features across languages in late bilinguals: an fMRI study. Lecture hosted by the Department of Linguistics, Stellenbosch University, Cape Town, South Africa, 13 May 2008.

Schwartz, S. 1982. Is there a schizophrenic language? *The Behavioral and Brain Sciences*, 5:579–626.

Sewell, E. 1952. *The Field of Nonsense*. London: Chatto & Windus.

Shorter, E. 1997. *A History of Psychiatry: From the Era of the Asylum to the Age of Prozac*. New York: John Wiley & Sons, Inc.

Simard, M. & Turgeon, Y. 2006. Psychosis and language. In K. Brown (ed. in chief). *The Encyclopedia of Language and Linguistics*, Vol. 10(Pou-Sca). Oxford: Elsevier. pp. 275–278.

Sledge, W., Hoffman, R., Hawkins, K., Docherty, N., Quinlan, D. & Rakfeldt, J. 2001. Linguistic deviance in schizophrenia: a preliminary report. In J. France & S. Kramer (eds.). *Communication and Mental Illness: Theoretical and Practical Approaches*. London & Philadelphia: Jessica Kingsley, pp.371–392.

Staats, A.W. 1968. Learning theory and “opposite speech”. In H.J. Vetter (ed.). *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas, pp.103–107. First appeared in 1957, *Journal of Abnormal and Social Psychology*, 45:268–269.

Swartz, S. & Swartz, L. 1987. Talk about talk: metacommentary and context in the analysis of psychotic discourse. *Culture, Medicine and Psychiatry*, 11:395–416.

Tavano, A., Sponda, S., Fabbro, F., Perlini, C., Rambaldelli, G., Ferro, A., Cerruti, S., Tansella, M. & Brambilla, P. 2008. Specific linguistic and pragmatic deficits in Italian patients with schizophrenia. *Schizophrenia Research*, 103(1–3):53–62.

Taylor, T.J. 1992. *Mutual Misunderstanding: Scepticism and the Theorizing of Language and Interpretation*. London: Routledge.

Taylor, T.J. 1997. *Theorising Language*. Amsterdam & New York: Pergamon.

Thacker, A.J. 1994. Formal communication disorder: sign language in deaf people with schizophrenia. *British Journal of Psychiatry*, 165:818–823.

Thacker, A. 2001. What can we learn from the deaf patient? In J. France & S. Kramer (eds.). *Communication and Mental Illness: Theoretical and Practical Approaches*. London & Philadelphia: Jessica Kingsley, pp.251–261.

Thomas, P., Bracken, P. & Leudar, I. 2004. Hearing voices: A phenomenological-hermeneutic approach. *Cognitive Neuropsychiatry*, 9(1/2):13–23.

Toolan, M. 1996. *Total Speech: An Integrational Linguistic Approach to Language*. Durham, NC: Duke University Press.

- Torrey, E.F. 1983. *Surviving Schizophrenia: A Family Manual*. New York: Harper & Row.
- Trumbetta, S.L., Bonvillian, J.D., Siedlecki Jr., T. & Haskins, B.G. 2001. Language-related symptoms in persons with schizophrenia and how deaf person may manifest these symptoms. *Sign Language Studies*, 1(3):228–253.
- Ungvari, G.S., Chiu, H.F.K., Leung, H.C.M., Chow, L.Y., Hong, Y., So, E.M.O. & Lum, F.C.K. 1997. Conceptual issues in the diagnosis of schizophrenic psychoses. *Hong Kong Journal of Psychiatry*, 7(2):4–8.
- Vetter, H.J. (ed.). 1968a. *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas.
- Vetter, H.J. 1968b. Preface. In H.J. Vetter (ed.). *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas, pp.vii–x.
- Vetter, H.J. 1968c. Introduction. In H.J. Vetter (ed.). *Language Behavior in Schizophrenia*. Springfield, Ill.: Charles C. Thomas, pp.3–27.
- Von Falkenhausen, J.F. 2008. The influence of Sigmund Freud's Clark Lectures on American concepts of the self [online]. *as|peers*, 1:21–32. Available from: www.aspeers.com/2008/falkenhausen [Accessed 27 July 2008].
- Walsh, I.P. 2001. Language and communication in schizophrenia: a communication processing model. In J. France & S. Kramer (eds.). *Communication and Mental Illness: Theoretical and Practical Approaches*. London & Philadelphia: Jessica Kingsley, pp.351–370.
- Wilkinson, R., Beeke, S. & Maxim, J. 2003. Adapting to conversation: on the use of linguistic resources by speakers with fluent aphasia in the construction of turns at talk (Chapter 3). In C. Goodwin (ed.). *Conversation and Brain Damage*. Oxford: Oxford University Press, pp.59–89.
- Wodak, R. & Van de Craen, P. (eds.) 1987. *Neurotic and Psychotic Language Behaviour*. Clevedon & Philadelphia: Multilingual Matters Ltd.
- Wolcott, R.H. 1974. Schizophrenese: a private language. *Journal of Health and Social Behavior*, 15 :126–134.
- Wróbel, J. 1990. *Language and Schizophrenia*. Benjamins, Amsterdam. Linguistic and Literary Studies in Eastern Europe, 33.
- Zilboorg, G. 1957. Eugen Bleuler and present-day psychiatry (Fellowship Lecture). *The American Journal of Psychiatry*, (Oct):289–298.